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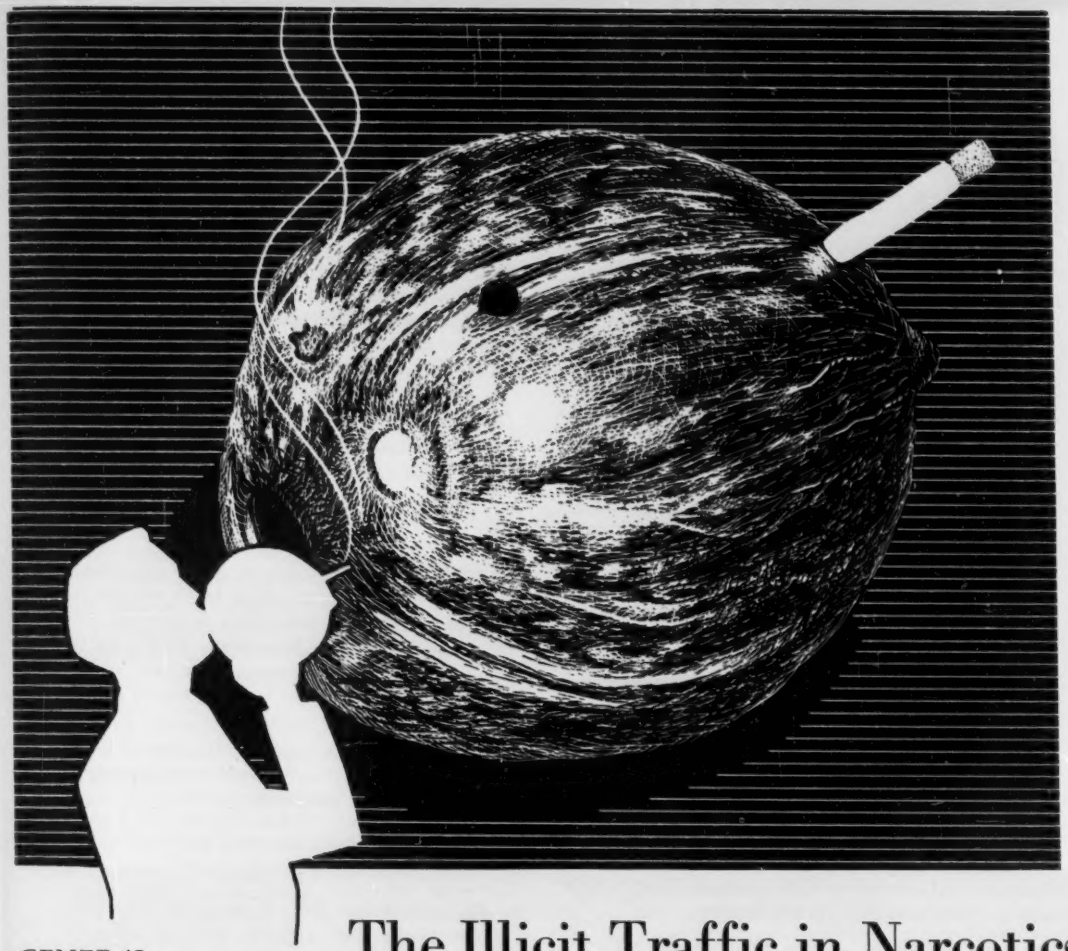

GENERAL

The Illicit Traffic in Narcotics Throughout the World

I. Introduction

At its fourth session held in May 1949, the Commission on Narcotic Drugs observed that "the volume of illicit traffic throughout the world was still considerable, that the amounts of narcotic drugs in the illicit traffic in certain areas had increased alarmingly, that clandestine factories were still operating and that a new danger had been created by the appearance of synthetic drugs".

While in the last thirty years, considerable progress has been made under both the League of Nations and the United Nations in checking the illicit traffic in narcotic drugs throughout the world, this traffic still is a serious problem.

Large financial gains, of course, furnish the incentive which keeps the traffic going. The basic cause of this pernicious trade, however, transcending the profit motive, is man's age-old tendency to seek escape from unbearable realities of everyday life. One way, and the most dangerous one, of satisfying this tendency is to produce a short-lived euphoria with the help of narcotic drugs.

The problem of the illicit traffic may be studied through a close examination of its constituent facts, which may be grouped as follows:

The volume of illicit traffic;

The routes of the illicit traffic and the sources of the illicit drugs;

The methods of concealment;

Survey of the situation in various countries and territories; and

Penalties.

The information given in this article is based on the data furnished by Governments in their Annual Reports and their Seizure Reports.

II. Volume of the Illicit Traffic

One of the first questions is the volume of the traffic. It must be pointed out here that the word "volume", in the context of this paper, is not intended to mislead the reader into thinking that the figures presented here cover all the narcotic drugs in the illicit traffic throughout the world. As a matter of fact, only a fraction of such drugs in the world illicit traffic is discovered.

While international and national machinery for fighting the illicit traffic has been greatly strengthened throughout the world since the inception of the League of Nations, the total quantities of drugs actually discovered and confiscated in the illicit traffic are estimated not to exceed 10 per cent of the total quantities of drugs in the world illicit markets.

Moreover, of all the cases of illicit traffic discovered, only the important ones are reported to the international control authorities and although in their Annual Reports countries are required to include information on the total quantities of drugs confiscated each year within their territorial jurisdiction, some countries fail to include such information in their Annual Reports.

The illicit traffic in narcotic drugs may be analysed, quantitatively, by using the available sample figures set forth in the following tables.

The table below gives a sample picture of the illicit traffic throughout the world in 1948 as compared with 1936. The figures for 1936 are chosen as the standard of comparison here because that year stood between two important events from the standpoint of international control of the illicit traffic, namely, the year of 1934, in the course of which the Narcotic Convention of 1931 came into force, and that of 1939, the eve of the Second World War, which strongly affected the course of the world's illicit traffic in narcotic drugs.

Despite the apparently lesser figure for 1948 in respect of opium, the volume of illicit traffic in opium in 1948 was, perhaps, larger than that in 1936; because the 1936 figure includes 115,809 kilogrammes of opium seized in Afghanistan, Burma, China, Lebanon, India

TABLE I

Narcotics	*1936* (kgs.)	*1948* (kgs.)
Opium	124,497	12,923
Prepared opium	11,811	4,444
Dross	6,253	15
Morphine	392	24
Heroin	867	36
Cocaine	96	19
Indian hemp	7,962	61,537
Resine of Indian hemp	8,297	18,760
Miscellaneous	134	43

(Pakistan), Syria and Palestine, while the 1948 figure does not contain such information, as no information in respect of these countries was given for that year. Subtracting the 115,809 kilogrammes of opium, the volume of illicit traffic in opium for 1936 would be only 8,688 kilogrammes, and the volume of the illicit traffic in opium in 1948 would show an increase instead of a decrease.

On the other hand, as for Indian hemp, the 1948 figure is so much larger than that of 1936 that it may be concluded that there has been an increase in the illicit traffic of Indian hemp during the period under review.

While it is not feasible to make exact comparisons between the volume of illicit traffic of one year and that of another, the table serves at least one purpose—it indicates that the problem of the illicit traffic throughout the world in 1948 remained serious, and that the volume of illicit traffic in Indian hemp in 1948 showed alarming expansion.

The illicit traffic in narcotic drugs may be further analysed, quantitatively, according to various groups of narcotic drugs and by continents.

A. Opium and its Derivatives

1. *Europe*

The table below gives a picture of the situation in Europe in the three post-war years as compared with that in the pre-war year of 1936, in respect of opium and its derivatives seized in the illicit traffic:

TABLE II

Narcotics	*1936*	*1946*	*1947*	*1948*
		(*grammes*)		
Raw Opium	2,347,420	55,635	953,655	1,474,780
Prepared opium	16,468	35,052	3,575	3,470
Dross	996	689	786	1,147
Morphine	54,935	29,403	228,350	16,509
Heroin	45,694	6,592	687	2,547

Illicit traffic in opium, morphine, and heroin increased during the post-war period in the United Kingdom, Germany and Austria, but decreased in France and the Netherlands.

Information from Poland, Czechoslovakia, Yugoslavia, Bulgaria, Hungary, Romania and Albania indicates that there was no illicit traffic in those countries in 1948. The

opium figure in respect of 1936 covers seizures made in Czechoslovakia, Yugoslavia, Bulgaria, and Romania. There is no information for that year in respect of seizures in Hungary or Albania; and information from Poland indicated that there was no seizure in that country in 1936.

The traffic in the Scandinavian countries, Ireland, and Switzerland was insignificant. There was no information regarding the situation in Italy and Portugal in 1948.

2. *The Americas*

The illicit traffic in opium and its derivatives—with the exception of prepared opium—has tended to increase since the Second World War, and seizures of raw opium for the year 1948 exceed those for 1936. The following table supports this conclusion:

TABLE III

Narcotics	*1936*	*1946*	*1947*	*1948*
		(*grammes*)		
Raw opium	154,356	91,968	193,106	264,740
Prepared opium...	234,429	93,652	88,087	39,648
Dross	542	57		6
Morphine	20,025	1,674	1,565	3,311
Heroin	58,843	9,427	24,279	29,525

In North America, Canada and the United States are important victims of the illicit traffic. Mexico is also important, both as a victim country and as a source of the illicit traffic although recently owing to stringent measures taken by the Mexican Government the situation in this respect has greatly improved. In Canada, there was a large seizure of opium in 1948, involving more than 165,000 grammes of opium. In 1947, on the other hand, only 5,439 grammes were seized, and in 1936, 8,264 grammes. In the United States, seizures of both raw and prepared opium have tended to decrease. In 1936, these figures were 140,206 and 221,347 grammes respectively, while in 1948, they had declined to 66,289 and 34,336 grammes. The traffic in morphine and heroin in the United States has decreased since 1936. Morphine seizures have declined from 19,054 to 2,094 grammes, while heroin seizures have fallen from 58,629 to 28,194 grammes. However, since the Second World War the traffic in heroin has increased, and may soon regain the proportions of the thirties. The figures for Mexico show that there has been a considerable increase in the traffic in that country in recent years, rising from 855 grammes in 1946 to 60,169 grammes in 1947.

Very little information is available for the other countries and territories of North and Central America.

The information received from South America is scanty and inconclusive, but what is available indicates that the illicit traffic in opium and its derivatives is not a serious problem in the majority of the countries of that continent.

3. *Asia*

The situation in Asia as regards the illicit consumption of opium and its derivatives continues to be very serious. The poppy is cultivated all the way from Turkey to China, and in such quantities that only a very small percentage can be utilized for the world's licit requirements. A great proportion of this opium is consumed locally, but the rest finds its way to Africa, Europe, and the Americas, where it satisfies addicts or is transformed into the more popular morphine or heroin.

Table IV, below, gives the available figures for the seizures of this group of drugs in Asia, with the same reservation as mentioned at the beginning of this section.

TABLE IV

Narcotics	*1936*	*1946*	*1947*	*1948*
		(*grammes*)		
Raw opium .	121,461,325	19,721,402	10,458,137	6,415,655
Prepared opium .	11,492,327	4,963,115	3,641,396	4,396,311
Dross ...	6,244,862	69,810	101,353	14,204
Morphine	317,592	8,944	44,369	4,094
Heroin ..	731,763	9,900	80,389	2,992

From the standpoint of volume of illicit traffic the following countries and territories in Asia are important: Burma, China, India, Indonesia, Iran, Palestine (Israel), Thailand, Syria-Lebanon, Indo-China, Hong Kong, Korea, Malaya-Singapore.

Burma

Seizures of opium in 1936 amounted to 16,946 kilogrammes. This has been considerably reduced in the post-war period. Total seizures in 1946 amounted to only 951 kilogrammes, but in 1948 they rose to at least 3,000 kilogrammes. Burma is still flooded with illicit opium.

China

In 1936, 91 tons of opium were seized in China, representing roughly 75 per cent of the total for Asia. Reports for 1946 and 1947 indicate that 2.9 and 3.4 tons of opium were seized during those years. The figures are inconclusive.

India

There has been a considerable increase in the illicit traffic in opium in India during the post-war period. In 1936, 1,136 kilogrammes of opium were confiscated, but in 1946 the figure was 5,238 kilogrammes; in 1947, 4,926 kilogrammes; and in 1948, 2,976 kilogrammes.

Indonesia

In 1936, 526 kilogrammes of opium were seized in the Dutch East Indies (Indonesia), but during the period 1946-1948, this figure was whittled down to between 250 and 200 kilogrammes per annum.

Iran

Very large seizures of prepared opium have been effected in Iran during the post-war period. The quantities seized rose from 44 kilogrammes in 1936 to 4,183 kilogrammes in 1946 and a similar figure in 1948. Seizures of raw opium dropped, however, from 947 kilogrammes in 1936 to 286 kilogrammes in 1948.

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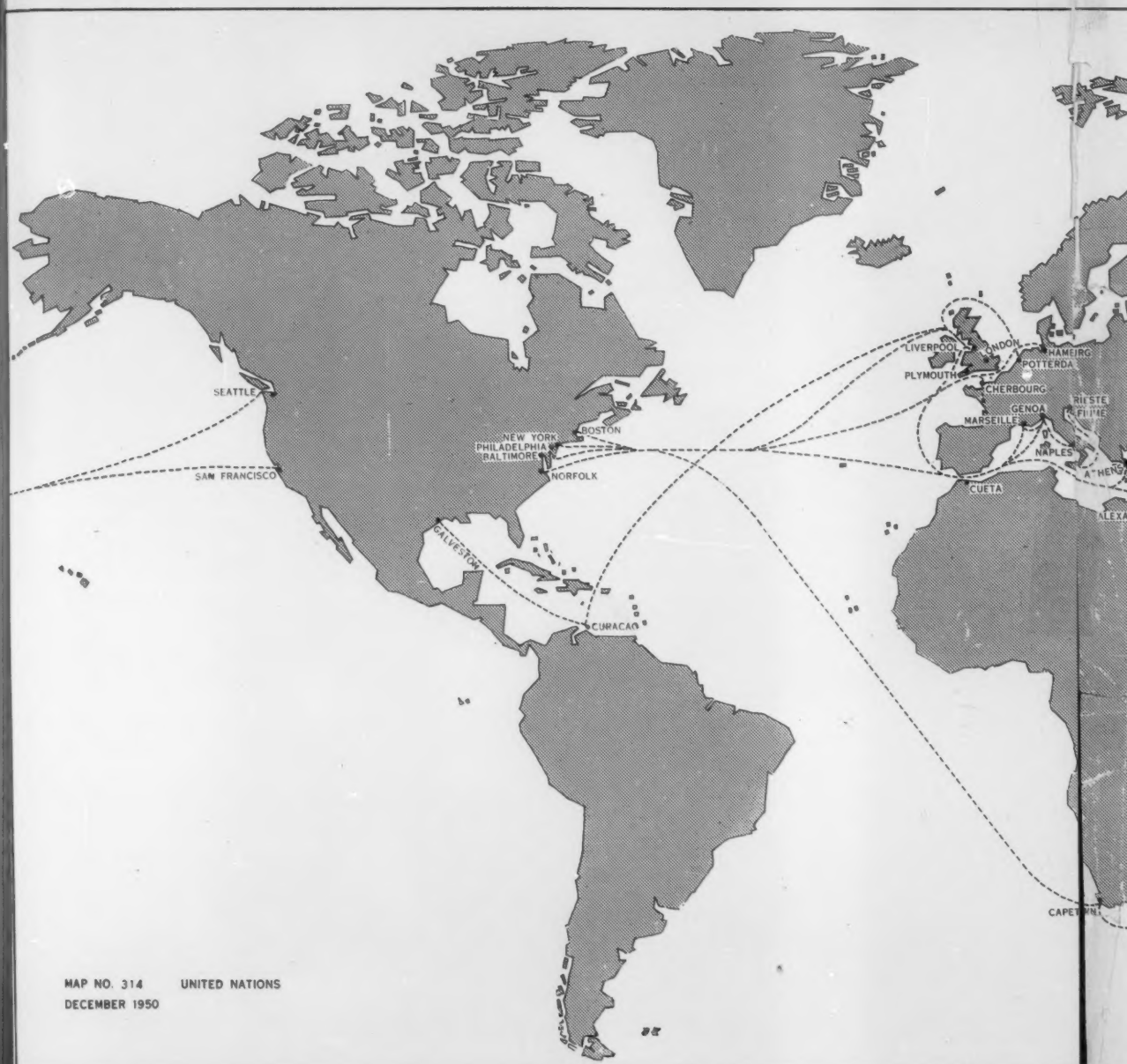

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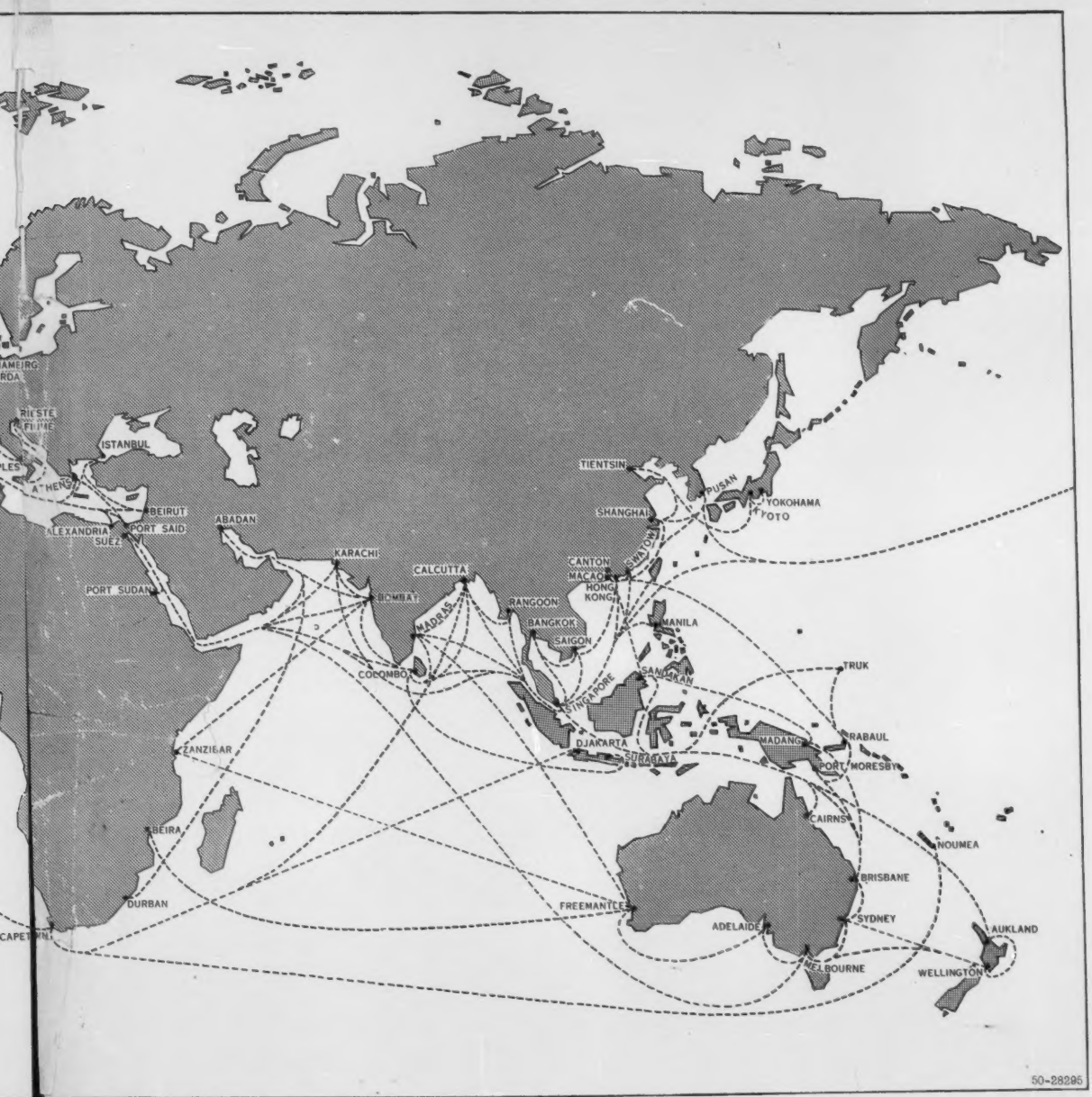


the period 1946-1948, according to the reports received from that area.

C. Indian Hemp

1. *Europe*

The use of Indian hemp in Europe is confined chiefly to Greece and Turkey. In 1936, for example, all but about 1 kilogramme of the 567 kilogrammes of Indian hemp seized came from these two countries and all but 8 kilogrammes of the 624 kilogrammes of the resin preparations confiscated. Post-war seizures in both Greece and Turkey have been considerably less; Indian hemp has ranged between 64 and 89 kilogrammes; the resin preparations between 166 and 74 kilogrammes. In both instances, the lower figures represented 1948.

2. *The Americas*

In Mexico, the pre-war total of 464 kilogrammes in 1936 rose to 1,202 kilogrammes in 1947 and then fell to 217 kilogrammes in 1948. The larger figure coincided with a special campaign to reduce the cultivation of the drug.

In the United States, the situation has grown more serious since the Second World War. Seizures amounted to 637, 800, and 1,475 kilogrammes in 1946, 1947 and 1948 respectively. This compares with the 1936 figure of 3,671 kilogrammes.

No figures of consequence are available for South America.

3. *Asia*

The illicit traffic in Indian hemp in Asia amounted to 2,116 kilogrammes in 1936, of which 2,092 kilogrammes were seized in Burma. No information has been received from Burma for 1947 or 1948. In 1946, however, only 492 kilogrammes of Indian hemp were seized in that country.

The illicit traffic in resin preparations of Indian hemp has tended to increase recently. In 1936, 6,970 kilogrammes were seized; ten years later, 8,063 kilogrammes; in 1947, 5,475 kilogrammes; and in 1948, 8,684 kilogrammes. A large percentage of this resin was seized in India. In 1948, seizures in that country had risen from a pre-war figure of 5,000 to 5,600 kilogrammes to the neighbourhood of 8,510 kilogrammes.

Other countries also report sizable seizures. Ceylon confiscated 1,141 kilogrammes in 1946, as against 752 in 1936. No information is available for the last few years. In Palestine, the figure rose even more spectacularly from 39 kilogrammes in 1936 to 1,204 in 1946. And, there too, there is no information for 1947 and 1948. In Pakistan, 321 kilogrammes were seized in 1947. Twelve years ago, 756 kilogrammes were confiscated in Syria-Lebanon, but no recent reports have been received from those countries.

In Malaya and Singapore, 153 kilogrammes were confiscated in 1948, while there were no seizures in 1936 or 1947. In 1946, the figure was 140 kilogrammes.

It may be concluded, therefore, that the abuse of Indian hemp is increasing in many parts of Asia, especially as regards the resin preparations.

4. *Africa*

As Asia is the continent of the opium poppy and South America the continent of the coca leaf, so Africa is the continent of the Indian hemp plant. More Indian hemp is to be found in Africa than in all the rest of the world combined. Table V offers statistics which support these statements.

Table V

	1936	*1945*	*1947*	*1948*
Narcotics		(*kilogrammes*)		
Indian hemp	1,141	12,464	898	59,788
Resin preparations of Indian Hemp	494	2,252	8,517	10,002
Totals.....	1,635	14,716	9,415	69,790

The foregoing figures show that the illicit traffic in Indian hemp products is on the increase in Africa. In analysing them, however, it is important to point out the fact that seizures of dagga (a form of Indian hemp) in South Africa are very large, and that no reports were received from South Africa for 1936 or 1947. During the 1930's dagga seizures in South Africa averaged about 15,000 kilogrammes, so that it is likely that the 1936 figure should be raised to about 16,000 kilogrammes. It may be worth while describing the situation in the various countries and territories of Africa, where hemp is grown, one by one.

Egypt

The influx of narcotics into Egypt, as reflected by the seizures throughout the country, has multiplied many times since the Second World War and constitutes one of the more serious problems in the control picture. Hashish, which is one of the resin preparations of Indian hemp, is consumed in great quantities in Egypt. Seizures have risen sharply from 456 kilogrammes in 1936 to 2,146 kilogrammes in 1946, 8,462 kilogrammes in 1947, and 9,655 kilogrammes in 1948. Since the resin is from ten to twenty times more powerful than the plant, this would be equivalent to between 100,000 and 200,000 kilogrammes of dagga or marihuana.

South Africa

Approximately 46,615 kilogrammes of dagga were confiscated in South Africa during 1948 which showed a considerable increase over the 1946 figure of 12,345 kilogrammes and the pre-war figures of about 15,000 kilogrammes. This constitutes the largest confiscation of a single drug reported to the United Nations by any Government.

Anglo-Egyptian Sudan

Seizures of hashish in the Sudan have also increased. They amounted to 33 kilogrammes in 1936; by 1948, they had risen to 346 kilogrammes.

Basutoland

Seizures of dagga in this territory increased from 60 kilogrammes in 1936 to 163 kilogrammes in 1947 and 1,324 kilogrammes in 1948.

Bechuanaland

Although there were fairly large seizures of dagga in Bechuanaland in 1936, no statistics were supplied in recent reports from that territory.

Swaziland

In 1948, very large seizures of dagga were made in Swaziland, totalling 11,051 kilogrammes. This compares with 395 kilogrammes in 1936 and 22 kilogrammes in 1947. Although the 1948 figure was probably the outcome of a "special drive", it reveals the extent to which *Cannabis sativa* is grown in the southern part of the African continent.

Tunisia

Seizures in Tunisia have also increased, although the increase is not so pronounced as elsewhere in Africa. The figure has risen from 471 kilogrammes in 1936 to 740 kilogrammes in 1948.

Elsewhere in Africa, the traffic in Indian hemp products also exists, but the seizures have been relatively insignificant. For many territories, statistics are not available; in others, enforcement measures are not pressed too strongly. In West Africa, the habit does not seem to be so deeply engrained as in other parts of the continent.

D. The Synthetic Drugs[1]

Although compared with the volume of the illicit traffic in the other narcotic drugs, the quantities of synthetic drugs seized have been small, all indications point to their increasing use and growing popularity among traffickers and their clients or victims—the addicts.

Dolantine (also under the names of demerol, pethidine, dolosal, etc.) has appeared on the illicit markets in the United States and British Zones of Occupation in Germany, the Netherlands, the United States of America, Australia, Canada and Mexico. In 1948, 32,500 tablets of dolantine were seized in Austria.

Methadone has been seized in the illicit traffic in Canada.

III. The Routes of the Illicit Traffic and the Sources of the Illicit Drugs

The routes or channels of the illicit traffic in narcotic drugs are the *prima facie* evidence of the itineraries followed by the traffickers in carrying their contraband goods from continent to continent, country to country or place to place.

For instance, assuming that a ship sails from Yokohama to Marseilles and on the way calls at Shanghai, Hong Kong, Bangkok, Calcutta, Bombay, and Port Said, and that at the latter port Indian opium is discovered on board, there would be sufficient *prima facie* evidence to establish a sea route of illicit traffic in Indian opium between Calcutta or Bombay and Port Said.

The directions of the routes vary according to the drugs, their sources of supply and the illicit markets and they may be classified as sea, land and air routes according to the nature of the conveyances by which the illicit cargo is shipped. Traditionally, illicit drugs are carried by sea or by land. In recent years, traffic by air has greatly increased.

A. Raw Opium

1. *Sea routes*

The principal routes followed by the traffickers in carrying on the illicit traffic on a global scale are those by sea. To avoid suspicion and detection, the traffickers seldom follow direct routes from the countries of origin to the illicit markets. They usually choose indirect routes to prevent the sources from being identified. This, however, is not a general rule and exceptions have occurred many times. For instance the Australian authorities have on several occasions discovered and seized raw opium in sticks on board ships which arrived at the Australian ports direct from Abadan, Iran.

Raw opium of undisclosed origin has been brought to Australia from and by way of Burma, Ceylon, China, Egypt, Hong Kong, India, Indonesia, Japan, Pakistan, Penang, Singapore, and the African coast.

Indian opium has been smuggled into Burma on ships from Calcutta by way of Akyab and Bassein, with Rangoon as the terminal of that sea route, while raw opium of unidentified origin has been brought by sea from Singapore and Brunei to the same terminal. However, the opium traffic in Burma is largely internal and follows the land routes. Illicit opium is smuggled to Ceylon from India.

In Egypt, Alexandria has been the terminal port of a sea route originating in Istanbul, Turkey. However, raw opium of Turkish origin is brought into Egypt principally by land through Syria and Lebanon, across the Suez Canal.

As one of the largest sea ports in the Far East, Hong Kong is a junction point through which opium routes run to and fro in all directions. From the east and north, Chinese opium is brought in from Swatow and Canton; from the west come Iranian and Indian opium. To the south, routes also extend to Indonesia and Australia.

[1] It may be pointed out that, in 1936, synthetic drugs were still at an experimental stage.

Opium routes extend by sea from Indian ports to the African ports, and Liverpool, Singapore, Rangoon, Bangkok, the ports on the west coast of the United States of America, and China and Japan.

Raw opium has been smuggled into Indonesia from Malaya, including Singapore; Thailand, and China.

Iranian opium has been shipped by sea to the Netherlands.

It is in Singapore that one finds the confluence of the largest number of sea routes of the illicit traffic in raw opium. Here the routes extend to Bangkok, Hong Kong, China, Japan and the Philippines; westward to Burma, India and Iran; and southward to Indonesia and Australia. Opium traffic on these routes runs in both directions.

The traffic in raw opium to the United Kingdom is conducted by sea. The routes ending in the United Kingdom have proceeded from Iran by way of Port Said, Newcastle, Trinidad and Londonderry; from Turkey by way of Malta and Sfax; and from Singapore, through Gibraltar and Trinidad. Opium has also been brought to the United Kingdom by way of the United States of America, Egypt, Gibraltar, Hong Kong and Trinidad.

Opium of Chinese, Indian, Iranian and Turkish origin has been smuggled to the United States by sea. The routes are often indirect. They reach the eastern shores of the United States by way of South European and North African ports. One route extends to the United States of America by way of Antwerp and Hamburg, another by way of New Caledonia.

2. *Land routes*

Raw opium reportedly of former German Army stocks has been smuggled from Germany into Austria.

The inter-zonal routes of illicit traffic in raw opium in Germany extend from the zone of occupation under the USSR to the British Zone; from the American Zone to the French Zone; and from the British Zone to the French Zone of occupation.

Turkish opium has been smuggled into Egypt by way of Syria and Lebanon, the route followed by the traffickers crossing the Sinai Desert and the Suez Canal and ending in Ismailia in Egypt. Invariably the opium is carried by men on foot or by camels. Opium is also frequently found among railway passengers travelling westward to Kantara, in Egypt.

In Burma, the land routes over which illicit traffic in raw opium operates are those originating in China, including that along the once famous "Burma Road" of the Second World War; in the Shan States in eastern Burma; and elsewhere within the country.

3. *Air routes*

Illicit traffic in raw opium by air has become more frequent.

In Burma, internal traffic by air from one part of the country to another has been often reported. Similarly, traffic by air from one city to another in Indonesia has been reported. Raw opium was transported by air from Penang to Indonesia and from Canton, Chungking and Kunming to Shanghai and Hong Kong.

Raw opium has also been smuggled by air from India to Pakistan and from Thailand to Penang.

B. Prepared Opium

The sea routes of illicit traffic in prepared opium extend from Hong Kong to Australia by way of the Philippines, North Borneo and Indonesia; from Calcutta; and from Singapore.

From Singapore routes extend to North Borneo, Brunei, Sarawak and the United States. The route ending in the United States also touches the shores of the Philippines.

Prepared opium seized in North Borneo was also reported to have been shipped from India, Singapore and Thailand.

The routes of illicit traffic by sea which end in the United States were reported to have originated also in India, Iran, Malaya and the Philippines.

Seizures of prepared opium from Mexico have been frequently made by the United States authorities at points on or near the Mexican border, and on the Pacific coast.

C. Morphine

Morphine has been smuggled by sea to Australia from the United Kingdom by way of South Africa and Indonesia, where illicit traffic in the drug was discovered to have originated in Hong Kong.

Morphine seized in the United States was reported to have come from the Philippines, Okinawa, Guam and Japan. The sources of these seizures were, reportedly, the military stores collected in the Far East during the Second World War.

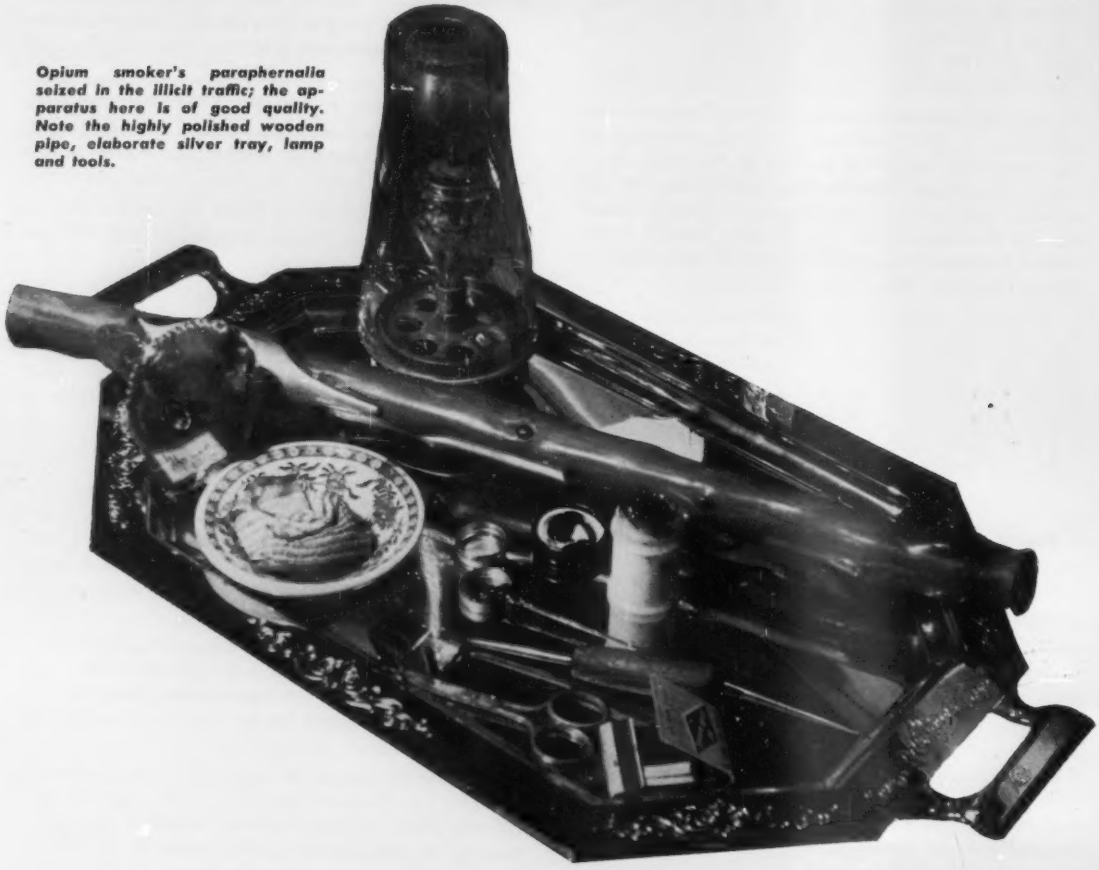
Routes of illicit traffic in morphine by land have been found to run between Austria and Italy; between the different zones of occupation in Germany; from Germany to the Netherlands, and to Austria from Czechoslovakia or Yugoslavia. Morphine from clandestine factories in Mexico has been seized in the United States at points on the Mexican border.

Morphine has been shipped by air from Kunming to Hong Kong and in Mexico from Culiacan to Tijuana.

D. Cocaine

Cocaine has been smuggled by sea to Burma by way of the Malayan ports from the other countries of the

SEIZURES OF NARCOTICS



Opium smoker's paraphernalia seized in the illicit traffic; the apparatus here is of good quality. Note the highly polished wooden pipe, elaborate silver tray, lamp and tools.

Marihuana (Indian hemp) cigarettes seized in the illicit market

100 FILTER TIP CIGARETTE TUBES
CRESCENT MARQUE
QUALITÉ SUPERIEURE • STERILE ET ANTISEPTIC
BUCKMAN & STRAUCH INC NEW YORK

Variety of materials seized in the illicit traffic: packages of heroin and morphine, opium in bulk, etc.

Far East; to the United States of America by way of Egypt, France, Greece and Italy. Large quantities of cocaine of Peruvian origin have been seized in the United States. Cocaine of Japanese origin has also been seized in the United States since the Second World War.

By land, cocaine has been smuggled from Austria to Italy, from the French to the British Zone in Germany and from Switzerland to Italy. One route extends from Germany into Austria.

E. Heroin (*Diacetylmorphine*)

The routes of illicit traffic in heroin run from Mexico to Canada by way of the United States and from coast to coast and city to city in Canada. Heroin found in Canada is frequently the so-called "brown" or Mexican type. Heroin is sometimes supplied by air from Montreal to Vancouver in Canada.

Heroin from Kunming, which was reported to have been shipped by air, was seized in Hong Kong.

F. Indian Hemp

The illicit market for Indian hemp in Australia has been supplied by sea from the United States, India, Iran and the United Kingdom. Indian hemp is smuggled to and from Pakistan. From the United States, Indian hemp has been smuggled to the Philippines.

Indian hemp is transported by train, lorry and camel to Egypt in a steady stream and in large quantities from Syria and Lebanon.

Supplies of Indian hemp (marihuana) from the illicit market in the United States are principally derived from Mexico. Routes of illicit traffic in Indian hemp exist also between Ethiopia and Anglo-Egyptian Sudan and between the latter and the Uganda border. The Union of South Africa is supplied by the adjoining territories.

In 1949 a case of smuggling of Indian hemp by air from Lebanon to Burma was reported.

G. Synthetic Drugs

Though the quantities of synthetic drugs in the illicit traffic have increased, the routes of the illicit traffic in such drugs have not yet been definitely determined.

Some traffic has been discovered between Mexico and the United States.

Another route of illicit traffic in dolantine (demerol) has been reported to exist between Germany and the Netherlands.

A small amount of pethidine was reported to have been smuggled by air to Australia.

A total of 32,500 tablets of dolantine were seized in Austria in 1948. The sources of these drugs were not revealed.

Dolantine tablets were seized in the British Zone of Germany and in Canada.

IV. Methods of Concealment

Traffickers are past masters in hiding illicit drugs either in storage or in transit. The methods of concealment employed by traffickers often escape detection by the most experienced inspectors of narcotic drugs.

In spite of the traffickers' ingenuity, illicit drugs are discovered by the authorities almost daily throughout the world.

When a ship is docked after completing an ocean voyage, it may be subjected to a routine inspection, or to a special search, on suspicion or advance information that the ship carries contraband in violation of narcotic laws. Such inspection or search has frequently uncovered hidden opium.

Reports received by the United Nations state that opium has been found concealed "in a canvas wind chute in an open store and paint room forward"; "under some steam pipes forward and on top of a ledge in the forepeak"; "on ledge under plates in the engine room"; "under shaft blocks in the tunnel aft"; "under the deck planking of the forepeak"; "behind the cable panelling outside the main saloon"; "in an air trunk in the lavatory forward"; "on a ledge under an air trunk"; "on a ledge in the forepeak"; "under rope tonnage space aft"; "in a tin in the lavatory"; "in matting in the tunnel engine room"; "in the after end of the tunnel" (in kerosene tins); "in the ship's tunnel inside three jute corn sacks"; "in a sealed tin in the water in the pump room bilges"; "in the false bottoms of tubs containing molasses"; "in the forward hold beneath some diesel oil drums"; "in the molasses"; "under the base of the dynamo engine in the main engine room"; "in the coal in the aft bunker of the ship"; "in the forward bilges"; "inside a rattan basket" carried by a passenger; "under tanks in false bulkheads and beams of the motor sampan"; "in drawers and lockers in the cabin of the chief steward"; "suspended inside three columns of the main engine by a cord fastened to bolts in the tops of the columns"; "behind lining in the gunners' messroom"; "in burlap bag inside a lubricating oil tank in the engine room"; "in a shaft alley on a ledge, port side, aft"; "in a cigarette tin on an overhead angle iron located in the seamen's lavatory, starboard side, main deck"; "on the floor planks of the crew's quarters"; "under the steps leading to the ship's engine-room"; "over a deck beam"; and "under the base of the anchor winch".

Opium has been found "on top of a truck in a fold of canvas roof", "in a bed roll" on a truck; and in a small passenger car, and under the front seat of a taxi.

When residential quarters were searched, opium has been found "hidden under a basin"; "wrapped in

banana leaves concealed under the bed"; "inside the drawer of a shelf near the (iron) safe"; "hidden in black Shan bag hung on the staircase"; "in two Horlick's bottles hidden in an earthen jar filled with water"; "in an aluminum drum in an underground tunnel underneath the kitchen. The opening of the tunnel was below the fireplace; it has been refilled with earth and dung and then cemented on top"; it has also been found "in front guest room" of a house; "in a cane basket in the bedroom"; "in a basket of wood pulp in the kitchen"; "concealed in a specially constructed hole in the wall between two apartments"; "inside a trench (or ditch) at the back of a house"; "in the brick wall behind the kitchen", and "in a smoking den in a cellar room".

Opium has also been discovered on a woman in a specially made inner jacket fitting her body closely and covered by a blouse, and in the pockets of her jacket.

Opium has also been discovered in parcel post; inside a portmanteau; in bags of rice carried on ponies' backs; in false bottoms of suitcases, and wrapped around the waist of an aeroplane passenger.

In Egypt, opium has been repeatedly smuggled in rubber containers concealed in camels' stomachs. Metallic containers were formerly used by the traffickers in Egypt. As the Egyptian authorities succeeded in detecting these metallic containers, rubber containers have now replaced them.

One vial of morphine was, on one occasion, found "concealed under a coil of rope in the forepeak" of a ship; and two vials were found, on another occasion, "behind books in the recreation room" on board a ship. It may be found in places least under suspicion.

Heroin has been discovered in a man's mouth concealed in a rubber receptacle. It has also been extracted from a man's throat.

V. The Situation in Various Countries and Territories

A. Countries

Australia

An illicit market for raw opium exists in Australia, which is also a transit point on the sea route of the illicit traffic in raw opium.

Illicit traffic in raw opium has increased considerably in Australia since 1936. The increase seems to be due to the high price prevailing in the illicit market in Australia. Before the Second World War, the price for a half pound tin of raw opium was approximately $24 United States currency. In 1948 it was approximately $96, or four times higher than before the war. During the war, as sources of raw opium were cut off, by sea the price rose to $320. The synthetic drug pethidine was also present among the manufactured drugs in the illicit traffic.

Austria

The narcotic drugs seized in Austria have primarily come from the pre-war German Army stocks.

There is some traffic with Germany and Czechoslovakia. The heavier and more frequent one, however, has been with Italy.

There also appeared in the illicit traffic in Austria synthetic drugs—dolantine tablets—for injection purposes.

Brazil

Besides seizures of opium and morphine, there are also seizures of *Maconha,* or Indian hemp.

Maconha is smuggled into Brazilian ports by seamen, and the illicit traffic in this drug is the principal problem facing the Brazilian authorities in the field of narcotic drugs.

Burma

Seizures of raw opium in Burma have, as usual, been large. Raw opium seized in Burma comes from Yunnan, Singapore, India, and the Shan States in the eastern part of Burma. The famous wartime "Burma Road" has been used by traffickers to bring opium from the north to Rangoon after passing through Mandalay. Smuggling by air has also been resorted to by the traffickers.

Canada

The enforcement of opium and narcotic laws in Canada is on a very efficient plane. Heroin is the principal drug in the illicit traffic in Canada; the balance of the seizures included opium, morphine, codeine, marihuana, and poppy heads. Heroin of the "brown" or Mexican type is frequently encountered.

A fair quantity of the heroin seized is believed to have been smuggled from the United States for distribution, especially to Vancouver. Despite the seizure of 437 grammes of heroin in 1948, large quantities were available on the illicit market.

There is practically no demand in Canada for raw opium, and supplies are very scarce. One seizure in 1948 was of Indian origin.

There has been a considerable increase in the number of persons found in possession of marihuana. Seizures of Indian hemp in bulk, leaves, seeds and cigarettes have also been considerable.

Ceylon

There is illicit traffic in opium from India by sea.

China

During the Second World War, those parts of the country occupied by the Japanese forces, especially Manchuria and the northern provinces, became centres and sources of illicit traffic in both opium and the manufactured drugs. Farmers in these areas were encouraged,

and sometimes forced, to grow the poppy. Drugs manufactured in these areas were smuggled into Free China. After the conclusion of the hostilities, though many large seizures of narcotics were made, clandestine factories destroyed, and poppy plants uprooted, a constant flow of heroin and other narcotic drugs from the northern provinces continued. Farmers continued to plant poppies clandestinely in their rice and wheat fields. In addition, opium, cocaine and other narcotics have been illicitly imported into the country.

Egypt

In 1939, on the eve of the Second World War, Egypt was facing the following situation:

1. A resurgence of illicit traffic in opium, hashish and manufactured drugs after a slight improvement since 1934;
2. An increase in number of addicts in the country;
3. A threat of an influx of hashish as a result of clandestine cultivation in Lebanon;
4. Mass production of manufactured drugs in the Far East.

During the war, although the illicit importation of heroin ceased owing to the closing of the sea routes, the supply of hashish and opium continued. The cultivation of hashish in Syria constituted a most serious threat to the control of narcotics in Egypt. In 1943 and 1944 the situation improved in Egypt owing to an intensified campaign to destroy hashish plants in Syria and Lebanon.

The situation in 1948 was still serious. Hashish and opium continued to flow into the country through illicit channels by land, sea and air. Seizures of other drugs were also reported.

With respect to the method of concealing drugs, the traffickers now use rubber containers instead of metallic cylinders for concealing hashish or opium, forced through camels' throats.

Indian hemp and opium poppies have been clandestinely grown in Egypt.

France

The number of seizures of narcotic drugs in 1948 was greater than that in 1947. The increase was due to more intensive measures of suppression exercised by the French authorities. Penalties have been made more severe.

Germany

United States Zone

The drugs seized in the illicit traffic within the zone originated in former German Army stocks or in railway trains abandoned by the former German Army. Other sources included thefts and pilferage of legitimate stocks.

Drugs seized in the illicit traffic include dolantine, morphine, cocaine, opium, codeine, heroin and Indian hemp.

British Zone

The source of supply for the illicit traffic in narcotic drugs in this zone has been medical stores abandoned by the German Army.

There has been suspicion and evidence of illicit traffic on a large scale between Germany (British Zone) and Belgium and the Netherlands.

The German Army medical stores provided one of the largest sources of illicit traffic in dolantine. In one store, there were found 3 million tablets of this synthetic drug.

Greece

Hashish, heroin, cocaine and opium were found on the illicit market and some hashish was imported from Albania.

Hashish was the most widely used; next came heroin and then cocaine and morphine. Opium was used on a very small scale.

Greece was also a transit point on the air routes of the illicit traffic.

Iraq

Illicit traffic in Iraq is confined exclusively to hashish from Syria and opium from Iran.

Japan

The chief sources of narcotic drugs in Japan were the former Japanese Army and Navy stocks.

Netherlands

The illicit market for narcotic drugs in the Netherlands has become smaller since the end of the war.

There have been illicit imports of cocaine from Germany by way of Belgium, and of Indian hemp (marihuana) on an American ship.

Small amounts of dolantine were also seized, reportedly from Germany.

Raw opium, which was reported to have come from Hong Kong, was also discovered and seized.

New Zealand

The illicit traffic in this country is confined to prepared opium. Fifty-two persons of Chinese origin were prosecuted in 1948 for possession of opium or for smoking it.

Pakistan

Opium was smuggled into Pakistan from India and Afghanistan.

Philippines

The illicit traffic in the Philippines was largely confined to prepared opium, which is frequently shipped by air.

The seizures of prepared opium in 1948 amounted to only 4 kilogrammes 26 grammes as against seizures of 468 kilogrammes in 1938. One of the sources of the prepared opium was reported to be Thailand.

Other drugs seized were Indian hemp (marihuana), morphine, cocaine and codeine.

The Philippines is also a transit point on the sea routes for illicit traffic in raw opium.

Union of South Africa

One of the most important illicit markets for Indian hemp (dagga) is found in this country. It is smuggled into the country by natives mainly from the adjoining territories, and sold in the large cities of the Union for handsome profits.

A small amount of opium is smuggled into the Union by sea.

United Kingdom

The only regular illicit activity in respect of narcotic drugs has been the unlawful import, by seamen, of opium and Indian hemp. This has been carried on almost exclusively by non-Europeans, chiefly of Chinese, Indian or African origin, and the drugs smuggled were used almost entirely by the smugglers themselves or by their fellow-countrymen. The illicit traffic in narcotics in the United Kingdom is largely confined to the seaport towns, although there have been reports of seizures of Indian hemp in the interior.

United States of America

Illicit markets exist in the United States for raw opium, prepared opium, morphine, heroin, cocaine, codeine, Indian hemp or marihuana and the synthetic drugs.

Raw opium seized in the illicit traffic in the United States is of Indian, Iranian and Turkish origin. Some Mexican raw opium has also been seized. Raw opium is smuggled into the United States primarily by sea, although Mexican opium is smuggled across the border by land.

Mexico was an important source of supply of prepared opium in the years immediately following the Second World War. Before the war, Macao, Hong Kong, Singapore and Kwangchowan were the sources of prepared opium seized in the United States.

Morphine sulphate seized in the United States was largely stolen or diverted from illicit channels. Some morphine tartrate solution was stolen or lost from United States military stores. Morphine hydrochloride of a muddy colour came from clandestine factories in Mexico.

Heroin seized in the United States was primarily of Turkish origin. It was smuggled into the United States by sea. Small lots of Mexican heroin have also been encountered in the illicit market in the United States.

Cocaine seized in the United States was of Peruvian and Italian origin. It was smuggled by sea. As far as Peru is concerned, the situation has, however, improved recently.

Codeine was largely stolen or diverted from legitimate channels, such as pharmacies.

Synthetic drugs such as demerol, metopon and dolophine are used more frequently than before as drugs of addiction.

By far the largest seizures of narcotic drugs in the United States are those of marihuana.

B. Territories

Aden

Opium is smuggled from Iran into Yemen and from Yemen into Aden, from which it is smuggled into Egypt by small boats.

Basutoland

There is illicit export of dagga (Indian hemp) to the Union of South Africa.

Federation of Malaya

The illicit traffic in opium and chandu was widespread throughout the Federation of Malaya during 1948. The enormous profit to be gained from this illicit traffic was undoubtedly one of the chief causes of its continuance. Good quality opium sold in some areas at over Malayan $600 ($US285) per pound (453.6 grammes), and good quality chandu for over Malayan $1,000 ($US475) per pound. These prices represented a gross profit of about 1,000 per cent to the organizers of the traffic.

One of the main sources of supply was Thailand, where the Government continued to operate a chandu monopoly. Quantities of opium and chandu also found their way into the Federation from Burma, India, Sumatra, Java and China. Opium has been shipped into the Federation by air from Thailand. It is also smuggled by sea.

There has also been considerable illicit import of ganja into the Federation.

Hong Kong

The colony is predominantly an illicit market for opium, raw and prepared. Raw opium is smuggled in and converted into prepared opium for local consumption.

Ships calling at Hong Kong, carry opium eastward, westward and southward. In this sense, Hong Kong is a junction point on several sea routes of illicit traffic.

Singapore

The amount of opium seized in Singapore is still considerable, but the quantity of opium seized which is carried on board ships touching Singapore, is even larger. Many illicit shipments of opium on board ships calling at Singapore from both east and west have been detected and seized, while many more remain undetected and pass on to ports farther along on their illicit routes.

Morphine, cocaine and Indian hemp are also present among the drugs seized in Singapore.

Sudan

Traffic in opium has not been on the increase. Hashish grows in the forest or bush. There is a considerable traffic in hashish from Equatoria Province to the Northern Sudan. Hashish has also been smuggled from Ethiopia into the southern fringe of the Blue Nile Province.

Trinidad and Tobago

Raw opium (3 kilogrammes 628.7 grammes), and prepared opium (2 kilogrammes 494.8 grammes), were smuggled from the United Kingdom.

Tunisia

The illicit market for narcotic drugs has been large. In 1948, seizures consisted of 4 kilogrammes 60 grammes of opium, 122 grammes of heroin, 373 kilogrammes 885 grammes of takrouri and 166 kilogrammes 170 grammes of Indian hemp.

VI. Penalties

Article 2 of the Convention of 1936 for the Suppression of the Illicit Traffic in Dangerous Drugs, as amended by the Protocol of 4 December 1946, provides that the Parties thereto shall "make the necessary legislative provisions for *severely punishing, particularly by imprisonment or other penalties of deprivation of liberty*", certain acts including those of the illicit traffic in narcotic drugs.

The Advisory Committee of the League of Nations and the Commission on Narcotic Drugs of the United Nations have repeatedly drawn the attention of Governments to the necessity of imposing severe penalties on traffickers.

The penalties imposed upon traffickers vary from country to country and from territory to territory. They may be classified as follows:

Fines (from nominal to heavy);

Imprisonment;

Fines coupled with imprisonment;

Imprisonment, in default of payment of fines;

In rare cases, and in one country only, the death penalty.

The principal factors which underlie the differences in the severity of penalties imposed on traffickers by the courts of various countries seem to be as follows:

1. The relative importance of the problem of the illicit traffic or of addiction in a country;
2. The concepts of penal law and their application;
3. The economic and social conditions;
4. The organization and efficiency of the special national administration in charge of the suppression of the illicit traffic and the prosecution of the traffickers.

In the light of these differences, it would be impracticable to expect all countries and territories throughout the world to adopt or apply a uniform system of penalties.

It must be borne in mind, however, that the function of penalties is to deter the crime of illicit traffic. Penalties which are obviously inadequate to carry out this function, should of course be replaced by effective and severe penalties.

It is generally admitted that small fines alone are insufficient and short prison terms prove ineffective. In these cases, the economic and social conditions of the individual human carriers of the contraband should count in determining the effectiveness of penalties. Heavier penalties should certainly be imposed upon the traffickers who are the principals or the organizers of the crime, than upon their hirelings, "employees" or "agents".

Post-War Japan and the Problem of Narcotic Drugs

At this first meeting of the narcotic procurators from all over Japan, I am happy to have the chance to express my opinion concerning the problem under my jurisdiction.

Importance of Narcotics

As analgesics and as cough medicines, narcotics are indispensable. The benefits obtainable from those drugs are the result of civilization, and laws and regulations concerning control of narcotics are to guarantee their safe and beneficial use.

However, because of the super-effective power of narcotics, the use is apt to become habitual, and the continual use of them results in unwholesome pleasure and indulgence which will result in misuse of the drugs and its prevalence, and finally the users become addicts who tempt others to the same habit. The resulting physical and mental disturbances will not only cause individual ruin but also disturb society and can destroy the whole nation. Because of such misuse, there is always illegal trading in narcotics regardless of control.

The effect of narcotics is guaranteed only by the proper use of them, and misuse and illegal trading cause hundreds of injuries and not a single benefit.

To look back upon the history of narcotic control in Japan, in all the friendly treaties with foreign Governments at the end of the Tokugawa Shogunate, clear statements were made as to the prohibition of opium in Japan. In the beginning of the Meiji Era, in a notification of the Government, stabbing, hanging, heavy labour, exile and other heavy penalties were established for misuse of and illegal trading in narcotics. New established laws in the succeeding years kept the principle of this notification.

Under the old Constitution, there were several narcotic control laws such as the Penal Law on Opium Smoking and the Opium Law. However, as violations expanded from mere smoking of opium to misuse of morphine and cocaine preparations, the laws and ordinances became insufficient. An adequate law was, for the first time, enacted after the termination of the war.

The international concern over narcotics was made clear in many pre-war treaties signed in Shanghai, The Hague and Geneva, and the Permanent Central Opium Board is still active in narcotic control in accordance with the Second Opium Treaty. The Commission on Narcotic Drugs of the United Nations has succeeded to the rights of the Committee of the League of Nations and is conducting similar activities. As you all know, the annual report of the Commission shows the narcotics control conditions in Japan after the end of the war and the Commission gives necessary advice to the Government through General Headquarters, Supreme Commander for the Allied Powers. From a humanistic and social viewpoint, control of misuse and illegal trading in narcotics can never be relaxed.

Present Status of Narcotic Control

As data have been lost, it is difficult to know the conditions of narcotic control before the end of the war. However, according to police statistics for ten years beginning in 1931, violations of the Penal Law on Opium Smoking were 77, violations of the Opium Law were 858 and violations of the Home Ministry's Ordinance on Narcotics Control were 675. The figures are highest around 1932 and 1933 and after that they rapidly decreased. From 1941 to the end of the war the figures must have decreased more rapidly. Something to be remarked upon here is that the rate of indictments, in these cases, is always 50-60 per cent of the total and usually twice as high as in other cases.

After the end of the war, until the Welfare Ministry's Ordinance on Narcotics Control appeared in June 1946, there were almost no cases of narcotics violation. But in August of the same year, 25 persons were arrested, and since then the statistics of the Prosecutors' Bureau as reported from the Prosecutors' Boards, in 1946 were 194, in 1947, 248, and in 1948 were 295, thus showing a tendency to increase. In 1949 the total number of cases reached 947 (about 1,400 people involved). In addition it can be estimated that many cases went unreported. When these figures are compared to the Welfare Ministry's statistics on people involved in nar-

This article is the text of a speech made to Japanese narcotics agents by Mr. Takahasi, Chief of the Prosecution Bureau in the Attorney-General's Office of the Japanese Government. It was transmitted to the Secretariat of the United Nations by the Commissioner of Narcotics of the United States of America.

cotics control violations, the rates of increase of both seem to be identical.

As for the disposition of the cases after the war, the standards of prosecution and penalization are different according to localities. At first, most of the cases were simply fined or probated for the reason that the amounts of drugs handled were so little that they were counted by grammes, or the defendants had no signs of being addicts, or their social positions were so high that it was embarrassing to punish them severely. But later, such attitudes were reformed, and recently the handling of cases has become much more adequate than before.

Case-finding Organization

For case-finding, besides the police officials and police employees, there are narcotics control officers who are special detectives. To discover narcotic cases requires special knowledge. Since 1947 the staff of the narcotics officers has been organized for reinforcing the control.

The narcotics control officer is appointed by the Welfare Minister from among the prefectural narcotics officials and works under the direct control of the Minister for handling of crimes concerning narcotics and marihuana. There are about 200 of them at work and the areas of their jurisdiction are all over the country. Arrests, in the majority of narcotics cases after the end of the war, have been by them. In order to make the control more complete, a draft of a law is now being prepared for presentation to the Diet which will make the narcotics officers national public officials belonging directly to the Ministry.

It is requested that all of you co-operate with the narcotics control officers, understanding that they have special knowledge and technique concerning narcotics, and that you give positive aid to increase their efficiency, by aiding their investigation procedure, and by giving them information on laws and regulations.

Disposition of Narcotics Cases

From recollections of your work in the past four years in dealing with narcotics cases, I would like to draw your attention to the standardization of prosecution and penalization.

According to the "status of disposition of narcotic cases" distributed to you, you will see that the penalties demanded and levied have been different according to localities, and cases cited do not seem to give you any unified principle since the facts in each case must be considered.

As for the standard of disposition of cases, we instructed you in the principle of strict punishment, in the "notification from the Chief of the Criminal Affairs Bureau", in January 1948. Also, at the end of last year, the Prosecutors' Bureau prepared a draft of standards of prosecution as a reference for your consideration.

At this meeting today, we will discuss this matter thoroughly so that we can expect to have a fair standard of penalty which will maintain the dignity of trials and prosecutions.

At the liaison prosecutors' area conference in February and March of last year, we requested you to report to the central office all the criminal cases of misuse and illegal trading in narcotics in which penal servitude was not demanded, but when the standard prosecution is established, we hope to abandon the reporting system and leave the handling of cases to the responsibility of each District Procurator's Office.

The second point I would like to call your attention to is thorough searching. To attack the very source of crime is always the key in every case, and in narcotic cases, to trace to the source is essential for prevention of further development of crime. In most of the cases reported in the past, the sources were often left undiscovered. We request you to instruct your personnel to search thoroughly for the source in all individual cases.

As for collection of evidence, it was often neglected to pick up empty ampoules and their fragments and syringes with remnants of narcotics and consequently much evidence was lost. Also, as the necessary analysis of the drugs was often neglected, many cases were released without penalty. Sometimes the addicts were left to be examined by doctors who had no specialized knowledge of narcotics, and the detention for examination was neglected. There were many cases in which prosecution could not be sustained. In your instructions to the detective personnel, this too should be emphasized.

The third point is how to sustain prosecution. In handling of narcotics cases, public prosecutors are, of course, expected to know all about the laws and regulations. Their interpretation and application of these should be correct. But we cannot expect all judges to fully realize the evils of narcotics and the importance of the control.

Prosecutors, when in court, should give the correct reasons for prosecution and penalization in each case they handle, and they should make the purpose of this control clear in their opening speech, by proving the fact that illegal possessors of narcotics are either addicts or illegal traders: they should bring the case to a successful conclusion (obtaining penalty demanded) by holding to this line of thought throughout the trial.

The last point I wish to mention is that prompt trial is necessary to accomplish the purpose of prosecution of any narcotic case, but this is especially true of narcotic addicts. Proof of addiction is difficult without detention. It requires great effort to soothe and pacify addicts for even one day, and they are also a bad influence on other inmates. Therefore the trial must be completed quickly in order to establish the fact of addiction clearly and to avoid trouble to others.

Early Days in Narcotics Enforcement in the United States of America

By Peter Valaer

Chemist, United States Treasury Department

Thirty-six years ago the Harrison Narcotics Act suddenly threw the burden of narcotics enforcement into the hands of some surprised Internal Revenue officials. I must admit that at first we were hardly equal to the task.

As I marvel now over those early adventure-packed years, I think of the vast changes that have since taken place, brought about by this law. Though it met much opposition and discouragement at first, it has done a vast amount of good—far beyond the hopes of even the most sanguine—and now is ably administered and functioning marvellously well.

It was my privilege to analyse the very first narcotic samples under this law. The ink seemed barely dry on the President's signature to the bill when samples began to pour into our laboratory from all directions. The first batch was turned over to us by State of Ohio and represented cases made by the peerless Ralph Oyler, then with the State and later with the Federal narcotics enforcement for many years. After that samples came from all parts of the country. When I first appeared in New York City to testify, the harassed office force of the District Attorney fairly cried for mercy. There were literally hundreds of cases piled up, and for every one that was tried, it seemed that ten new ones were being made. It was much the same in other large cities. As the overworked narcotics agents said to me, it was like bailing out the ocean with a teaspoon.

We chemists had a real job at the start, for we had done no such work before. The most helpful publication at that stage was Earl Putt's article, "Microchemical tests for the identification of some of the alkaloids", published in January 1912, in which Putt included proof-positive tests for the very alkaloids that most concerned us. He described the red plates yielded by morphine with iodine solution and the platinum chloride tests for heroin and cocaine, and these same tests have been in use ever since, just as "M", "H", and "C", have remained the "big three" of the illicit drugs traffic. Fortunately for us in those early days when we were inexperienced and overworked, all the drugs were pure (unmixed) and only sure identification was required. It was only years later, after the prohibited drugs had become scarce, that mixing became common. Nowadays there is usually more milk-sugar, powdered sugar, corn starch, mannitol, magnesium sulphate, sodium bicarbonate, or some other filler in a sample than there is heroin. At the start all samples for Federal prosecutions were sent to Washington for analysis, even Customs seizures of opium. We had to travel all over the country for court cases, at a time when there was no travel by air. We carried our own small compound microscope, a box of reagents, and our narcotics drug book, which contained what we had been able to learn about the subject. Many samples had to be examined in the field, sometimes even while the case was going on.

Sometimes we became discouraged. The prohibited drugs were apparently quite easy to obtain, and to add to our discouragement it seemed for a time that the law might be held unconstitutional. But it survived and its good work went on and on. In the meantime, for several early years, drug addiction was tremendous and crime resulting from it sometimes seemed completely out of hand.

On one of my first trips to New York while taking an early morning walk before the court session, not far from Fifth Avenue, an empty one-eighth ounce heroin bottle was thrown out of an upper window and rolled at my feet. A short distance away I found another, then another, in fact five empties within a block. An observing street cleaner with his long brush and pushcart saw me picking these up and exclaimed, "Son, if you want those little bottles I pick up hundreds on my beat and I'll save them for you." In those days one could smell from the street the crude opium cooking and smoking opium burning in many disreputable laundries and low

types of chop-suey cafés. A raid on one of these places would yield what now seems like a fabulous amount of smuggled opium, both crude and prepared for smoking. Accumulated armfuls of fine opium pipes, lamps, and other smoking paraphernalia were stacked in the Revenue offices about the country like cordwood, but soon went to the furnace.

Action against opium smoking came a little earlier than action against the use of the "white drugs". In fact, "An Act to prohibit the importation and use of opium for other than medicinal purposes" was enacted as early as 1909, but it chiefly concerned smuggling through Customs and was not fully effective within the country. It was amended and greatly strengthened early in 1914, and at the same time a companion Act was passed, entitled "An Act regulating the manufacture of smoking opium within the United States, and for other purposes". Both were approved 17 January 1914, while the Harrison Act was approved near the end of the same year. Thus vigorous enforcement all along the line began in 1914 and 1915.

The Act regulating the manufacture of smoking opium as the basis of its action imposed what was intended to be a prohibitive tax: $300 per pound on opium prepared for smoking. Before the law became effective even the finest quality of smoking opium could be obtained for probably about $10 per pound. Of course prices rapidly rose as enforcement became effective, but for a good many years between World Wars the illicit prices were in general fairly stable, raw opium selling for about $50 per pound and smoking opium for $80 per pound. At the present time the price for smoking opium of very inferior quality has risen to about $450 per pound. Today it would actually be possible for the manufacturer to pay this enormous tax if he could import opium legally, but of course such a thing would not be tolerated for one moment, and there are plenty of other legal barriers, including the fact that the Smoking Opium Act also requires that the manufacturer post a bond of $100,000.

The opium pipes in early days were often very elaborate. The best I ever saw was adorned with little frogs with diamond eyes. When the pipes became subject to seizure they began to get poorer and poorer and today they are hardly more than a few pieces of rubbish fastened together.

As I have already mentioned, the 1909 Opium Act was chiefly concerned with smuggling. Under it we obtained our earliest experiences in raiding and in court cases. I was always greatly flattered when invited to go along on a raid with the Customs inspectors. It was highly exciting, for sometimes a raid would lead into the big city's Chinatown. Now and then a big haul of opium was obtained and sometimes only a few firecrackers were found.

One time I remember the officers had two objectives: to learn where the "cooking" of opium was going on and to arrest a dangerous smuggler, if they could find him. I was given the relatively ignominious task of standing guard by the kitchen door to see that no one came in or went out. While the officers raided the premises from the subterranean passages below to the very roof, I began looking around, more from boredom than anything else, inspecting the pots and pans; but when I peeped into a rice barrel I saw two huge automatics partly covered with rice. I had taken them out and was looking them over when suddenly the door flew open and a man dashed in and dived for the barrel, looking for the guns. When he saw me I pointed the guns at him and he backed into the corner and stayed there, until in a few moments the officers arrived and arrested him. He was the very man they had been after.

Of course, I need hardly say that at the present time the "Chinatowns" are fully as law-abiding as almost any other parts of our large cities, and such adventures are practically a thing of the past.

In one case I played a large part in convicting the opium cookers. Sure that they were on the right track, the raiding officers had hacked through a great heavy door, but when they entered, although they found some huge copper boilers still warm, these had been cleaned, scrubbed out, and practically polished. These boilers were shipped to Washington by freight and washed out with gallons of warm water, which was then evaporated down; but I could get no opium test from it. However, on one kettle was a mere thread which had probably once held a price tag. Opium had soaked into it and from it I was able to get an unmistakable test. The District Attorney advised the defendants and their attorneys of the evidence against them and they pleaded guilty. We afterward learned that smuggled raw opium had come through the big door, but five-tael tins and "hop toys" of smoking opium customarily went out through secret panels while the door was barred. When the raid was made the cookers got everything out through the secret panels except the big boilers, which were cleaned and polished while the officers were hacking at the door.

The black molasses-like mass of smoking opium looked very harmless to a jury. I often had to describe to the jurymen how I had seen it used, and then take out a little of the evidence on a match and burn it in court, where it always filled the room with its unmistakable odours.

One more story about the opium raids. The owner of a hotel where we were staying at the time learned who we were and begged to go with us on a raid. However, when we came to our destination he decided that he would rather stay out on the sidewalk. We first found quantities of pipes which we took down and gave

OPIUM PIPE MADE OF A PIECE OF RUBBER HOSE AND A SMALL EARTHEN POT

him to hold while we went in again. But when the semi-drugged patrons learned it was a raid they rushed pell-mell down the steps to the street, where stood our hotel man with his arms full of opium pipes. Nearly every one of them struck at him as they fled, and when we came down with the rest of our evidence, he was at home doctoring black eyes and other bruises and the pipes were scattered all over the sidewalk.

Although my official capacity was strictly that of an analytical chemist, the raids on the pedlars and suspected premises of various kinds seemed to me a shining adventure, and when away from home in various cities I accompanied the narcotics agents on many occasions. We attended court in the daytime, but our nights were filled with chasing violators, raiding dens and arresting pedlars, opium dealers and addicts. At first they rarely took it lying down; and many a fight and shot took place and threats of dire vengeance rent the night air as we slugged it out with desperate men and half-crazed addicts. There were plenty of narrow escapes and more than one brave government agent laid down his life for the cause. As I recall, there were four or five killed in the first year or two of the Harrison Act.

Once in Toledo, Ohio, a notorious pedlar—also wanted for murder for killing a policeman—suddenly sat up in bed as we burst into his room and pulled the trigger of a revolver five times in my face, but by mistake he had loaded a rim-fire revolver with centre-fire cartridges. As the officers subdued this man I hurried into a back room, and there his young wife was uncorking bottles and throwing them into a laundry tub with the water running to wash away the narcotics. In her haste, she spilled some on the floor and I stooped down to sweep it up on a piece of paper. I looked up just in time to find her lunging at me with a hatpin about fifteen inches long. Several times I had to jump out of the way to avoid being killed as she lunged at me repeatedly, until one of the State officers entered the room and knocked her unconscious with one blow. We unscrewed the sink with a monkey-wrench and from the goose-neck trap we recovered some water in which I later found on analysis four different narcotics: morphine, heroin, cocaine, and codeine. At the trial I asked the woman why she tried to kill me and she sneered: "You're a cop, aren't you?" I said "No", and then she said "If you are not, I ought to have killed you twice, for butting into something that was none of your business". She came from a criminal family and had been taught from earliest childhood to hate the police and to regard them as mortal enemies. As with most narcotics pedlars, selling drugs was not the only activity of either of this pair. The woman's skirts were all equipped with shoplifter's pockets, and in her husband's coat at the time of the arrest was a bottle of "soup" (nitroglycerine) for blowing safes.

After several years of thrills during which we often faced waving revolvers, I decided that perhaps I had better adhere strictly to the chemical end of narcotics enforcement before my luck ran out, but by that time most of the really dangerous excitement had subsided, anyway.

During the early days a hideous but lucrative practice had sprung up among some unscrupulous and heartless doctors who catered to addicts by the thousands, giving morphine injections and selling prescriptions and never hesitating to take the last miserable cent from an addict. A war without quarter was declared against them throughout the country. In New York City I participated in making five cases in a single night, during which I posed as an addict seeking morphine and purchasing prescriptions. The favourite question was: "Do you 'jab' or do you 'blow'?" i.e. inject morphine hypodermically or snuff up cocaine.

At one place the doctor's assistant suspected me, and I was startled when suddenly I felt the hard muzzle of an automatic in my back. The doctor waved away the gun but insisted on examining my arms for marks of the hypodermic needle. Up to then he had overlooked the little matter of a physical examination, but he had already sold me the prescription for morphine. He said, "You are not an addict", and I said, "I want to buy the stuff just the same". He actually let me walk out with the prescription, and when he was tried and convicted I felt a little sorry for him, for no doubt he had saved my life when he waved away that gun.

Due to the relentless campaign of publicity as to the true significance of this monster evil it became easy to convict the guilty, as there was never any public sympathy for one who would degrade his fellow man and bring him down to miserable ruin. There could be mate-

"STICKS" OF OPIUM OF IRANIAN ORIGIN

rial for writing volumes in the many exciting events, spectacular court cases and tong and gangster wars that resulted from the narcotics trade and the early enforcement efforts against those who illegally sold, gave away, or possessed the derivatives of opium and coca leaves.

There are still some big cases made, but nowadays an agent may go a long way for a single case and usually the chemist can carry the narcotic evidence to court in his pocket. In the early days when we went to court, we had an average of fifteen or twenty cases at a time and carried five or six suitcases bulging with drugs to be used as evidence. During the first few years two or three of our largest cities averaged seventy or more cases during each term of court. Several weeks were often set for solid blocks of narcotics cases, and defendants were delivered by bus loads for trial.

In our early cases in Florida, in order to simplify the chain of evidence we were told to keep the drugs in our possession at all times. However, on one occasion I had a great deal of evidence and in addition I didn't much like the looks of the old hotel in which we had to stay, so I decided to keep only constructive possession of the evidence by carefully sealing it up and placing it in the marshal's vault. That night someone entered my hotel room and woke me up and demanded the drugs. After I had offered to turn up the lights to allow him to search my room, he left without another word. I didn't shine as a hero in this case, but I learned a lesson about not keeping large quantities of narcotics in my immediate possession.

The chemist's testimony was primarily the identification of the narcotic, and this was often conceded. However, now and then, a lawyer would sit down and pull a sheaf of manuscript out of his pocket and give the expert witness a good work-out in organic chemistry.

Some judges were very technical and others were the opposite. The technical-minded judges had thrown out a few cases because the prosecution had failed to prove that the evidence was a derivative of opium, so when I testified I was always careful to say that the substance was morphine or heroin, "a derivative of opium". However, one day in the deep South, the judge said: "Hey, young man, we are glad to have you come to see us, but you don't have to come way down here to tell us that morphine is a derivative of opium!"

In those early times the idea was prevalent that opium could not be produced in the United States. Of course, it was and still is true that the opium used in the United States is produced in other countries, whether legally imported for medical use or smuggled in for addiction. But some officers had already testified in good faith that it could not possibly be produced in the United States, and apparently it struck the court like a bombshell when I first testified that I had myself grown opium poppies and produced opium.

In order to learn about all aspects and be fully prepared for cross-examination, I grew these opium poppies at Arlington farm, where the huge Pentagon building now stands, incised the pods, obtained crude opium, extracted this and made smoking opium, and burnt the latter to *yen shee,* analysing all the products and obtaining some pure morphine from each as a basis for testimony from personal knowledge.

At a later date I again grew poppies at Arlington with the intention of analysing various parts of the plants for morphine. I obtained morphine even from tiny seedlings only one inch tall.

I remember causing another sensation in court when one day I was escorted directly from the train to the witness stand (because the trial was already under way)

and testified that diacetylmorphine and heroin are one and the same thing. A little later I discovered that four officials of a large drug company, not defendants but involved in some way in the case, had testified on the preceding day that the two were different substances, apparently in order to get the case thrown out of court by a discrepancy between the indictment and the proof. The case concerned the seizure of a large drum containing, as I recall, 10 million heroin tablets. The defendant's lawyer insisted that because this number of tablets had been named in the indictment, each tablet would have to be individually examined. However, the judge required him to pick out 50 tablets from the drum—the tablets all looked the same so it was really a random selection—and that night it seemed to me that I nearly went blind examining them in the poor hotel light, in order to have the analysis ready for court the following morning. The manufacture of this drug of so many evil potentialities has been forbidden in the United States for many years now. A wise move indeed.

Then there was the paregoric case in West Virginia. This preparation had become a terrific nuisance and danger throughout the nation, being exempt from the requirement of a prescription. Many top officials thought we were helpless to cope with it without a new law. Paregoric was on sale not only in all drug stores but even in grocery stores, and anyone could purchase one or a dozen bottles, or even a basketful, without hindrance.

In the jurisdiction of the court, where the first case was tried, there were hundreds of victims, principally women, who were hapless slaves to this preparation. We decided to try to make a case under the existing narcotic laws, and did so. In analysing samples, I used the famous Buchbinder method, which enabled me to extract practically pure morphine from that complicated mixture—and it was well that I did, as the frantic defence attorneys gave me an inquisition that I shall never forget. But the case was won and a great principle confirmed.

My closest brush with death in the laboratory, or at least the one that frightened me most, came indirectly from narcotics. The early officers often sent in any kind of a white powder or tablet that they found, including aspirin, tooth powder, bicarbonate, bromo-seltzer, and all sorts of small tablets. Being full of youthful vigour then, I loved to identify these things and was proud of the reputation of never having failed to tell what the substance really was. This time I got some tablets which were in a regular morphine bottle, but were said to have caused entirely different symptoms from morphine when injected into patients at one of the large government hospitals. So the tablets had come to me, but all I could find was milk sugar—a quantitative analysis showed nearly 100 per cent—and innumerable extractions and direct trials resulted only in blank tests. My tablets were melting away and I resolved on a supreme effort. Getting up at daybreak Sunday morning I went to the laboratory and resumed my testing. By this time I had practically convinced myself that the tablets were "placebos"—nothing but milk sugar—so as I worked I occasionally nibbled on a tablet to see if I could notice any taste or other effect such as the numbing effect of cocaine on the lips and tongue. But I noticed nothing at all and kept on the same way until at noon I had perhaps eaten the equivalent of several tablets. Suddenly the symptoms hit me. The floor seemed to rise and I seemed to be sinking down, down, down. The sensation is almost indescribable. I was so frightened I hurriedly wrote on the desk that if my unconscious or dead body should be found, I had eaten too many of the tablets. However, after a little while, the symptoms eased up until I was able to walk and I hurried home. Early Monday morning I was back searching the medical books for descriptions of symptoms. I finally decided that the symptoms of nitroglycerine sounded most like what I had experienced, and when I tested the tablets for this, sure enough, that's what they contained. Some one on the hospital force had become addicted to morphine and stolen the original tablets, replacing them with nitroglycerin tablets which were about the same size. This addict was afterwards discovered.

I remember also the menace of the red heroin pill, when the country suddenly became flooded with pills for smoking in lieu of opium, containing caffeine, cinchonine, heroin, usually aspirin or salicylic acid, and a red dye. The vogue for these pills started in China, where they were manufactured in Shanghai and other places. Eventually we found a pill factory on Wentworth Street in Chicago. After the true character of these pills was discovered and the full strength of narcotics enforcement brought to bear against them, they rapidly disappeared from the scene.

I remember also the beginning of the marihuana law—but perhaps that brings us too nearly up to date. Narcotics enforcement officers now do not have to contend constantly with the violence of the early days, though their work is still difficult and sometimes dangerous, with occasionally a death by violence such as occurred in St. Paul, Minnesota, only a short time ago. It is now far harder to make a case and more intelligence is required. The chemist must know more than ever, for new opiates have been introduced and the new synthetic analgesics are capable of causing addiction as serious as that of morphine and have also been placed under the law. Those who pioneered the enforcement work accomplished wonders and the Bureau of Narcotics has ably continued the task. Indeed the suppression of narcotics in the United States has been successful beyond the wildest dreams of those early days when we witnessed the beginning of enforcement under Federal law.

Cannabis

By Dr. J. Bouquet

(*concluded*)

III. Cannabis Intoxication

A. Acute Intoxication

Since about 1840 the nature of *temporary acute intoxication* caused by cannabis has been examined in many publications. Unfortunately many of these publications merely reproduce earlier studies.

Though these studies are conscientious and fairly comprehensive, they are open to criticism in various respects:

1. First, the experiments deal only with a few subjects of a high intellectual level who are members of advanced civilizations (this also applies to the brilliant but over-literary account of hashish intoxication given by eminent authors such as Baudelaire[42] and Theophile Gautier).[43] Thus, the conditions described are not those usually found among the mass of low-class addicts having little or no education, and the psychological reactions cannot be the same.

2. Most of the investigators analyse hashish intoxication caused by the absorption of products with a cannabis base *through the mouth*. They hardly deal at all with hemp smokers. It would appear, however, that the symptoms caused by *smoking* and *swallowing* hemp are not quite the same.

3. Experiments have nearly always been performed with pharmaceutical products (cannabins, fat or soft extracts of Indian hemp), or with complex preparations of the illicit trade (such as dawamesk). In these cases it is difficult to ascertain that they do not contain other active substances besides hemp. The natural drugs, such as tops, charas, hashish, etc., cause partly different and less-marked symptoms.

We live in the present through the action of our will, which draws our attention to objects of immediate interest. Through memory we live in the past. A perfect memory would enable us to live our whole life over again, starting from the moment when we became aware of ourselves. Imagination enables us to live in the future. With this faculty we are easily able to create an entirely new world, patterned upon our own desires.

The effect of absorbing the substances which Charles Richet[44] has so appropriately called the "poisons of the intellect" is to weaken the individual's will, the faculty which controls, sorts out, groups and correlates ideas according to logical laws. Thus in the case of the intoxicated subject, memory and imagination predominate, he becomes entirely absorbed in the past and the future, and loses sight of the realities of the moment.

Cannabis is a drug which affects the mind most powerfully. Besides producing a delirious excitement of the imagination and stimulating the memory to an extraordinary degree, it engenders a state of exhilaration, well-being and bliss which forms one of the greatest attractions to addicts.

The first effects of an adequate dose of a drug with a cannabis base are felt not more than two hours after *ingestion*. "You experience a feeling of physical and moral well-being", says Moreau de Tours, "of inner contentment and intimate joy. You cannot understand or analyse or explain these indefinable sensations. You feel happy, you say so, you proclaim it with exaltation, you endeavour to give vent to your joy by every means in your power, you repeat over and over again that you are happy, but you cannot find words to explain to yourself how or why you are so happy."

Motor excitation. The subject feels himself to be strong, agile, elegant, and capable of extraordinary feats of prowess. He experiences an intense desire to move about. Walking, jumping, dancing seem desirable things, and yet the sensation of ineffable tranquillity and perfect happiness which dominate are so strong that he usually abstains lest it should leave him.

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* For the Introduction and parts I and II of this article, see *Bulletin on Narcotics*, vol. II, No. 4, October 1950.

Superior figures in the text indicate reference to the "Bibliographic Notes" on pages 44 and 45.

Weakening of the power of control. During this period, his intellect is calm, and he retains the full strength of his will. Gradually, however, his mind becomes filled with ideas foreign to the subject on which he is endeavouring to fix his attention. All of a sudden he is overcome by absurd but irresistible laughter, caused by any trifling incident, which very often is not in the least funny. A commonplace sentence, a very ordinary act, the sight of some person, may be sufficient to provoke the subject to mirth. At this stage the most usual objects appear strange, new, and extremely amusing.

Dissociation of ideas. The phase at which ideas become dissociated coincides with a need for conversation and effusiveness. Extraordinary conversations take place, giving rise to the most extravagant misunderstandings, which are greeted with new bursts of wild laughter. The subject talks excitedly, argues heatedly about trifles, and is astonished to see that persons around him do not appear to share the excitement he feels. The conversation becomes more and more fantastic and incoherent as the will, yielding to the action of the drug, loses its power to direct thought where and how it wants.

An increasingly rapid train of ideas surges through the mind; they follow one another with bewildering speed and are immediately expressed, regardless of their nature, "so that the rush of words and nonsense is due not only to the exaggeration of ideas, but also and chiefly to the fact that every idea is expressed" (R. Meunier).[11]

The symptoms at this stage of intoxication sufficiently explain why hashish addicts like to consort together when consuming the drug. The opium addict, on the contrary, prefers to indulge alone, as he does not pass through this stage of voluble excitement and effusiveness.

During this phase of cannabis intoxication the subject tries to express a multitude of thoughts simultaneously and feels that this is impossible because speech is too gross to express such beautiful thoughts and not fast enough to reproduce the swiftness of his thoughts. Ideas well up incessantly (*this, however, only applies to addicts who are to some extent educated*); they whirl through his brain, becoming ever more lively and striking and are associated together in the most unexpected ways. The addict feels it in his power to solve the most abstruse philosophical and scientific problems; he could have the most brilliant ideas,* perform the most heroic deeds, and experience the most wonderful emotions . . . if only he deigned to do so.

Hypertrophy of the ego. He considers himself superior to all other human beings. "When the wretch has taken but one drachma he lifts his head higher than the Emirs", says a Persian poem. "I am become God", proclaims Baudelaire. The hashish addict looks on his fellows with very great, but friendly, contempt. He considers them as much inferior to himself in every way but feels a deep affection for them, and is grateful to them for existing as by their own unworthiness they enhance his sense of his own importance.

Delirium. This stage in cannabis intoxication is marked by an extraordinary intensification of the feelings as well as by a hypertrophy of ideas, to use Charles Richet's[44] expression. "The emotions are extremely exaggerated and paradoxical. The simplest acts become theatrical, and the person announces in a tragic voice or with peals of laughter that it is raining or that midnight has just struck" (Moreau de Tours). The exact notion of persons and neighbouring objects is also lost. "At times I could see my friends", writes Theophile Gautier, "but they were deformed, half man and half plants, with the pensive look of an ibis, perched on the leg of an ostrich and looking so strange that I doubled up with laughter in my corner, and in order to join in the absurdity of this scene, began throwing cushions into the air".

Horror of noise. This mental confusion gradually increases. The moments of lucidity become shorter and shorter and the addict gradually surrenders entirely to his subjective impressions. The loud and boisterous gaiety marking the first stages is succeeded by a pleasant sensation of moral and physical lassitude. He no longer wishes to speak or hear others speak, but wants complete silence. Tunisian hashish addicts have told Dr. J. Bouquet that at this stage of intoxication they were painfully affected by the ticking of a watch and even by the slight buzzing sound made by mosquitoes.

The least effort becomes an almost impossible exertion and the mind allows itself to be deliciously lulled into a state of apathy, indifference and complete calm. Life seems easy, pleasant and devoid of material cares.

Notion of time. This stage is also marked by a complete change in the notion of time. The progress of time appears infinitely slow, because between two clearly received impressions a multitude of others well up which are hazy and often incomplete, but which delight the subject by their number and variety and by the interest he attaches to them, as the critical sense no longer functions. These ideas, particularly those only half-formed, seem innumerable, and as time is only measured by the memory of them, it appears infinitely long.

Notion of space. The notion of space is also wholly impaired. It is difficult, however, to obtain an exact conception of this phenomenon without having personally experienced it. The distance between the subject and a person standing quite near him appears enormous. The hand seems to be separated by an enormous space from the glass it attempts to seize. If stairs have to be

* Recent American documents have referred to the case of a young student who, while under the action of marihuana, was convinced she had found the solution to a certain problem connected with her work, and jumped out of the window of her room in order to reach more rapidly the place where she worked.

mounted, the steps appear to extend to the sky. Dr. J. Bouquet explains this phenomenon by the fact that in hashish intoxication all objects are seen by the addict through a mist (this may simply be the result of the dilation of the pupil caused by the drug). A thick and sometimes multicoloured mist seems to envelop everything, making the horizons recede, rendering outlines indistinct and blurring and idealizing shapes. This is so marked that such faulty perception sometimes interests the intoxicated person himself. "Look how my arms have lengthened; my hands are already right over there and my fingers change their shapes when I move them as if they were made of soft clay", said one addict.

Deformation of perceptions. At this stage of intoxication, therefore, the senses, particularly sight and hearing, are extremely acute; but the perceptions are all distorted, and the distortions are constantly varying and altering. The shape and colour of objects are often changed. A picture, flowers or an ordinary tapestry becomes a wonderful landscape, a place of enchantment. A bare wall becomes covered with brilliant and fantastic foliage of extraordinary plants and with strange animals and gorgeous patterns. Everything becomes animated and swarms, dazzles and changes, obeying the whims of the excited imagination; then pales, blurs and dies away, to be replaced by new and equally seductive visions.

Dual personality. A peculiar sensation of dual personality is sometimes observed. The addict is conscious of his real ego, which functions normally, while another fantastic and capricious personality exists side by side with it and gives rise to innumerable phantasies.

A Tunisian hashish addict told Dr. Bouquet that his other personality, which he contrasted by calling "his friend Hachoum", appeared to him every time he took hashish, in the form of an old, ironical and ill-tempered dwarf, who mercilessly criticized all his thoughts and deeds and never wearied of gibing at the plans and resolutions which the drug suggested to his real personality.*

Suggestibility. This is the stage of great suggestibility. A bystander need only tell the intoxicated person that a thing exists for it immediately to appear before his eyes. Any impressions made on the senses immediately give rise to imaginary perceptions, that is, illusions and hallucinations. R. Meunier[11] was able, with the aid of hemp, to influence subjects who were completely unamenable to hypnotism or to suggestion in the waking state. Any orders given during delirium are carried out even if their execution is fixed for the following day. It is easy to realize the dangerous consequences of such acute suggestibility from a social point of view, and that hashish addicts have been made to commit crimes under the influence of the drug (e.g. the history of the Old Man of the Mountain, the assassination of General Kleber in Cairo, etc.).**

E. Pascal[39] attributes this acute suggestibility of the hashish addict to the persistence of relationship with the outside world. Whereas in certain forms of intoxication (e.g. opium and morphine) the senses are lulled and it is difficult to communicate with the subject, the senses of the cannabis subject are sharpened, so that the most varied ideas can successfully be conjured up in his mind.

Hallucinations. The extreme suggestibility of the hashish addict is useful, however, in certain cases such as those of experimental intoxication. It sometimes happens that certain subjects are the victims of painful hallucinations. They believe they are being pursued by wild beasts or threatened by assassins. As they are extremely emotional, this causes them acute suffering, and it is important that some agreeable idea should be suggested to them so that their minds are diverted to pleasant thoughts, as they would not hesitate to jump out of a window to escape the imaginary dangers which terrify them. The number of reported attempts at suicide is remarkable. Fortunately their motor incapacity is usually such that they are quite unable to move. Thus, R. Meunier mentions the case of a woman who, when intoxicated by hashish, found life so futile that she wished to kill herself, but had not the strength to seize a revolver placed within her reach.

Acute sensitiveness to sound. It is at this stage, too, that auditory sensations become extraordinarily keen. The slightest musical sound, the peal of a bell, the vibration of a string, a gramophone record, produce the effect of inexpressibly beautiful harmony. Charles Richet observed people who were ordinarily not very sensitive to music plunged by a few musical sounds into a state of indescribable ecstasy and bliss. Dr. Gobert[22] mentions the case of an addict who used to dip the strings of his mandolin, which hung on the wall, in sugar-water before smoking his hemp. When the appropriate stage of intoxication was reached, the flies, alighting on the strings, cause vibrations which sounded exquisite to his ear.

As the hashish subject feels all the nuances of the music with such extraordinary intensity, he may, on

* The visual hallucinations caused by hashish intoxication among North Africans frequently consist of gay, lively and vividly coloured Lilliputian elves (Dr. Perrussel)[22]. This is very rarely mentioned in records of hashish intoxication among Europeans. Dr. J. Bouquet considers that this is merely due to the fact that one of the popular traditions of the natives of North Africa is a firm belief in the existence of people known as "Hijouj and Majouj", tiny beings living far away at the end of the world, behind a large wall built to keep them out, as the world would come to an end if they succeeded in knocking it down.

** See report O. C. Cannabis 8 by Professor Mazhar Osman Uzman[28 bis]. He mentions various cases of suggestibility.

hearing certain passages, burst into tears, or be overwhelmed with grief or terror.*

These phenomena are easy to explain. Sounds have the power of awakening memories and evoking certain associations of ideas which, in turn, bring the emotions into play (Moreau de Tours).[18] They therefore affect the understanding, imagination and sensibility. Ideas are associated with each sound, or at any rate with the various reasoned combinations into which these sounds enter. As imagination and the memory, that is, the evocative faculties, are in a condition of acute sensibility under the influence of hemp, memories of dangers, losses of friends and sad thoughts, are at once connected with sad tunes, and happy and joyful thoughts with lively tunes. Such thoughts and memories have an almost boundless influence on the understanding at this stage.

Disturbances of the affections. Memory and affection are, like the imagination, over-excited at this stage. Scenes long forgotten reappear before the addict's eyes and are re-enacted in their smallest details. The memory of beings dear to him comes back with intensity and persistence; he would like to have all his friends with him and to overwhelm them with attention and marks of the greatest affection, and regards them all as ideally faithful, sincere and devoted.

On the other hand, if he has an aversion to anyone, his antipathy is transformed into a fierce hatred. He is convinced that he has now everything to fear from his enemies and that they are hatching some odious plot against him. There is only one step from this point to the belief that danger is imminent. The addict often reaches this stage and becomes a prey to sudden fits of terror and irresistible criminal impulses. This accounts for certain violent reactions, sometimes murders of relatives and friends, committed under the influence of the drug. Jealousy intensified by hashish intoxication has, in North Africa, been the cause of many criminal attempts on women, wives, and mistresses. (See O. C. Cannabis[12] by Professor A. Porot (of Algiers), and [56].)

Oneiric ecstasy. If this irritability does not come to a head—and fortunately this is usually the case—the over-stimulation of the imaginative faculties gradually decreases. The mist which blurs every object and person present or conjured-up gradually thickens. The bright colours disappear and a grey tone predominates. Even objects close at hand become indistinct, as in twilight. The tired brain no longer seems to have the strength to follow the memory and the imagination in their wanderings. The addict gives himself up to a sort of calm and tranquil ecstasy, at times still occasionally interrupted by a few fitful dreams. This is the stage called "kif" by the Mohammedans, that is, blissful rest.

The duration of the above stage may vary according to the personal reactions of the individual to cannabis. It is gradually succeeded by a deep and heavy sleep. Sometimes, though rarely, the addict may awaken after a short interval to experience a new attack of delirium.

The addict usually wakes up in good spirits. His physical depression is not very marked and in general he remembers what he experienced during his intoxication unless the dose was a large one. In the latter case, the delirium is not so intense and may even be no more than deep slumber accompanied by dreams.

E. Pascal[39] explains this persistence of the memory by assuming that hashish intoxication does not completely inhibit normal consciousness; the subconscious divagations are registered, and can be remembered after the crisis. The addict's suggestibility and his delirium and hallucinations prove that he is in a subconscious condition, but the persistence of the memory indicates that consciousness still subsists.

Summary. To sum up, hashish intoxication may be divided into four main and distinct phases:

1. A condition of excited mental well-being accompanied by motor excitation.

2. Mental confusion accompanied by illusions and hallucinations (the stage described by North Africans as *"fantasia"*).

3. Oneiric ecstasy (called *"kif"* by North Africans).

4. Depression and sleep.

The picture just given of hashish intoxication is, of course, somewhat schematized.

The phenomena do not always occur in the same order, and some of them may be constant in one individual and altogether absent in another. In some cases, visual or auditory illusions predominate, in others painful hallucinations or cerebral erotic dreams, or, again, fits of poignant melancholia. These depend, as Professor Pouchet has said, on the country, race, culture and, above all, on suggestion, the latter word being used to apply to the influence of outward circumstances at any given moment. As Dr. Blondel[45] has said, "each hashish addict has the dream he deserves".

Revelation of the subconscious mind. In all cases, however, an exaltation (in varying degrees) of the individual's most common thoughts may be noted, that is, his subconscious leanings are revealed.

This phenomenon is the result of the weakening of the will under the influence of the drug, which, in the circumstances, acts like most cerebral stimulants, including alcohol (*in vino veritas,* says the proverb). The drunkard likes talking; he is communicative and reveals the inmost depths of his character. The hashish addict's

* A Tunisian hashish addict told Dr. J. Bouquet that when under the influence of takruri he could not listen to a gramophone record of Om Kalsoum, the Egyptian singer then in vogue, without being plunged into a poignant fit of grief, which spoiled all the pleasure he derived from the drug, the songs of this artist being usually imbued with sadness.

intimate and secret thoughts are not only revealed by certain unconscious movements, but also by his words, acts, illusions and hallucinations.

E. Pascal[39 bis] concludes from this special action of cannabis that it would be useful in psycho-analysis. Dr. Lage[70] is of the same opinion.

Effect on the genital system. When erotic excitement occurs during the crisis of intoxication, it is *purely cerebral.* No physical changes occur, so that it is wrong to ascribe aphrodisiac properties to Indian hemp. Certain oriental preparations with a hemp base (such as majoun, dawamesk, etc.) undoubtedly have this property. (See documents O.C.1542(d) and O.C.1542(o).) This is, however, due to the fact that in these preparations cannabis is combined with other substances which act on the genital system. Hemp by itself has no such properties. "A hashish addict would not lift a finger for the most beautiful maiden in Verona", says Théophile Gautier.

* * * * *

The observations of cannabis intoxication which have brought to light the nature and order of the phenomena just discussed were based on generally educated *European* subjects who had ingested preparations with hemp extract base *through the mouth.*

The question arises whether the phenomena are the same in the case of *smoked* hemp, when the persons drugged are people of little education and intoxication becomes chronic owing to frequent consumption. Investigations of such cases can only be carried out in regions where the use of the drug is common.

Many difficulties are encountered in North Africa in the endeavour to study hashish intoxication from the information provided by native addicts. They are suspicious, and dislike confiding in an investigator. Most of them, too, are incapable of analysing what they experience. As a rule, they simply say that they consume hemp "because it makes them happy". That is about as much as can be elicited from them.

Mental disturbances

Certain conclusions may be drawn from the investigations carried out by Dr. J. Bouquet:

1. If the resin content is approximately the same, the effects are more rapid (manifesting themselves after about a quarter of an hour) when hemp is smoked than when it is swallowed. They are, however, less violent, except when a few rapid pulls are taken at a pipe of chira. In the case of takrouri (chopped tops) eight or ten pipes must be smoked over a period of one or two hours before the period of euphoria sets in.

2. No rapid sequence of amusing and witty ideas can be observed during the period of euphoria, of the kind noted in cases of experimental intoxication among educated Europeans. There is only a flow of absurdities, coarse jokes and obscenities, often on homosexual topics.

3. The phase of motor excitation is usually little marked. This may be due to the fact that the native who desires complete intoxication always smokes reclining on cushions or mats.

4. This phase of motor excitation appears to be frequently replaced by a period of extreme volubility of fairly short duration, interrupted by characteristic fits of high-pitched, spasmodic and uncontrollable laughter.

5. Acute sensitiveness to sound, changed notions of time and space, and coloured visions always occur.

6. Emotional disturbances are generally fairly marked. Besides the affectionate form, which is the *most frequent,* there is also that in which the exaggeration of the natural sadness of the subject promotes the irascibility and impulsiveness already marked among these populations in their normal state.* The tendency to suicide has not been observed.

7. The period of oneiric ecstasy ("kif") is more liable to be caused by smoking than by ingestion, and lasts longer; for North Africans are more prone to contemplation than to activity.

8. Intoxication is followed by deep sleep. On awakening, the addict shows marked symptoms of mental and physical debility. Chronic addicts who consume large doses daily hardly ever awake from a state of manifest torpor.

Hence the phenomena observed during hashish intoxication *vary* according to whether cannabis is smoked or cannabis preparations are ingested.

The effects of the drug appear to be stronger when it is absorbed through the digestive tract.

The symptoms also differ according to the subjects' education and social level.

Additional investigation is essential and must be undertaken in the countries where cannabis is consumed.

Physical disturbances

S. Dontas and P. Zis (*Archives internationales de Pharmacodynamique et de Therapeutique, 1928,* p. 30) also consider that the effects of hemp are less violent when smoked than when ingested. Their opinion is based largely on the study of observations of physical disturbances.

It should not be imagined that acute cannabis intoxication (even the simple crisis in experimental intoxication) has no subsequent effects on the organism.**

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* Professor A. Porot and J. Sutter.[47]

** See, as regards America, Dr. G. Lage[70] and Dr. L. Angulo.[71] The observations of these authors as a matter of fact differ very little from those made in Asia and Africa.

The physical symptoms generally observed are the following:

1. *During intoxication caused by ingestion through the mouth of cannabin preparations*

(a) *First period:* Generally corresponding to the phase of mental excitement accompanied with motor excitation. The following may be observed: Pressure on the temples, profuse perspiration, changes in the respiratory reflexes, tachycardia, numbed or cold extremities, muscular hyperesthesia (the subject when seated has the sensation of falling; when walking he tends to collapse), tactile hyperesthesia, nausea and occasional vomiting (interrupting the effect of the drug);

(b) *Second period:* Generally corresponding to the phases of mental confusion and, occasionally, oneiric ecstasy; a sensation of blasts of hot or cold air on the face, a whirling sensation in the head, dilated pupils, buzzing noise in the ears, constriction of the epigastrium.

The symptoms mentioned in (a) and (b) are not always present simultaneously among all subjects. Some of them may be altogether absent.

If the dose is a large one, the symptoms of both periods may occur simultaneously.

(c) *Symptoms after the crisis of acute intoxication.* Certain sensitive subjects show symptoms of oneiric delirium for several nights on end, interrupted by sudden awakenings accompanied by a sensation of anguish.

2. *Intoxication caused by smoking*

The symptoms observed are as severe as in cases of intoxication caused by charas (hashish, chira). They are less marked, and some of them, (e.g. profuse perspiration, vomiting, constriction of the epigastrium, cold extremities) rarely occur when intoxication is due to smoking of the actual plant (ganja, takrouri).

In all cases where intoxication is due to smoking preparations, however, the following symptoms are also observed: dryness of the mouth and pharynx, thick and sparse saliva, irritation of the throat causing coughing, intense thirst.

These symptoms are particularly marked among beginners, who say that hemp smoke pricks and reddens the eyes. Before the smoker can derive agreeable sensations from cannabis he must go through the discomforts of habituation. It is this indispensable "apprenticeship" that has in part repelled Europeans living in the regions of the Old World where hemp is consumed; hence the extremely small number of addicts among them.

After intoxication, hemp smokers nearly always show symptoms of a saburral condition of the digestive tract accompanied by dryness of the mouth and irritation of the upper respiratory tracts. A dry cough, loss of appetite and a marked fall in the blood pressure are observed among inveterate smokers.

Cases of acute intoxication due to hemp are rarely fatal. Medical literature at present contains only one fatal case reported by Prentiss (1885).[46] Furthermore, the annual reports issued by the Egyptian Central Narcotics Intelligence Bureau report one death due to cannabis intoxication in 1928 and two (in 1930 and 1932 respectively), attributed to manzoul (a mixture with a base of hashish and aromatics). In 1934, A. Dreyfus[50] reported the fatal intoxication of a man who had absorbed a large quantity of bread stuffed with kif.

B. Chronic Intoxication

Save in very rare cases acute experimental hemp intoxication has no serious consequences. Though its mental and neuro-muscular effects are acute, they are also ephemeral, and the healthy body quickly recovers from its physical disorder, provided of course that the subject abstains from fresh recourse to the drug within a very short space of time.

If, on the other hand, he has not the strength to resist the drug's attraction, a state of chronic intoxication soon sets in and the outlook is serious. The transition to the chronic state takes place imperceptibly, as with all forms of drug addiction; despite occasional struggles against it, the drug addict finds it very difficult to escape from its grip and the use of hemp quickly becomes an imperious necessity.

But whereas the study of acute intoxication shows that the phenomena are more marked with *ingested* hemp preparation than with *smoking* hemp, the study of chronic intoxication shows that the most rapid and serious forms, and those involving the most disastrous consequences, are due to hashish (chira, charas) smoking. Only exceptionally, (in the East at any rate), does the smoking of chopped hemp (ganja, takrouri, kif, etc.) make the addict a complete mental and physical wreck. That is the explanation of the fact that very few cases of insanity from cannabis addiction are found nowadays in North African mental asylums, whereas some forty years ago the figure was very high. That was because in those days hashish (chira) could be obtained with the greatest ease in North Africa; but since about 1910 the drug has become almost unobtainable and smokers have to be satisfied with raw cannabis ends.

1. *Chronic intoxication through raw hemp smoking*

Mental troubles. The subject becomes less and less inclined to work, is indifferent to everything and finds the least effort burdensome. As Dr. Gobert says:[22] "The daily use of hemp affects the inclinations, feelings and intelligence of its devotees to such an extent as to unfit them for normal human intercourse and remove them to the edge or fringe of society." When he is not smoking, the drug addict, generally jovial, voluble, amiable, and often over-attentive, sometimes passes abruptly from

good-naturedness to unsociability and irritability. Moreover, he always suffers from lapses of memory and his actions and conversation become disconnected.

When these unfortunates are under the influence of the drug they appear to be stupefied and their walk is as uncertain as that of a drunken man. At a later stage of intoxication, except in the case of old addicts, the most striking symptom is the condition of euphoric and excited delirium followed by a period of dreamy ecstasy and then by sleep, though this is never of very long duration in such cases.

Physical troubles. In the early stages of chronic intoxication there is scarcely any trace of somatic disorders. The subject continues in good health but his fitness for work and resistance to fatigue diminish. At a later stage he frequently suffers from headaches, and to get relief, he has himself cupped and scarified at the nape of the neck; in his own words: "he has his blood drawn". Recourse to this remedy at frequent intervals increases the subject's weakness. The next development is often a progressive anorexia. The addict eats only one very frugal meal per day, even if he does not go without it altogether, and instead just eats a few sweet pastries or chews dry seeds (peanuts, almonds, toasted marrow-seeds). At this stage anaphrodisia and partial impotence are frequently noted, often ending in sexual inversion. The addict also very frequently becomes emaciated and his capacity for work falls to zero. Unless he is fortunate enough to have parents in a position to assist in providing for his needs he sinks to the lowest depths. These unfortunates, morally degraded and incapable of any continuous physical effort, supply a high proportion of the criminal element, incorrigible thieves and sexual offenders.

Such victims scarcely ever attain a condition of dementia: it is not in mental asylums that they are to be found, but in the riff-raff of professional beggars, vagabonds and thieves.

If, however, the addict begins to consume hemp again at very short intervals, his life becomes a sort of stupor interspersed with increasingly frequent fits of ecstasy, alternating with crises of melancholic depression and hallucinations. These hallucinations often assume a terrifying form, and by strengthening the more or less delirious convictions of the addict, sometimes lead him to commit dangerous acts.* He has to be confined. When it reaches this stage, chronic intoxication from hemp is one of the aetiological factors of *mental epilepsy*. (Professor A. Porot): "It presents the same characteristics as intoxication from the abusive use of hashish (charas, chira). The same applies to addicts who, in an endeavour to prolong the period of intoxication and increase its intensity, mix the hemp with henbane (sikran), datura or opium". (See document O.C. 1724—X.)

How many years are needed to transform a normal being into a wreck of this kind? That cannot be determined. To begin with, there is the factor of individual resistance, but the rapidity of degeneration depends above all on the quantity of drug habitually consumed. On the other hand, hemp smokers are to be found who have been addicted to this vice for many years (thirty, forty or fifty) and who, apart from a certain obvious mental instability, show no signs of physical troubles, seem to have preserved normal health, and continue to follow their occupations. But in all these cases the individuals had managed to regulate and restrict their drug consumption. A few daily pipes of kif are merely an agreeable weakness, enough to induce the condition of euphoria and well-being which they desire. They can rest content with that. Needless to say, rational addicts like these do not constitute the majority. The same observations have been made in India.[66]

2. *Chronic intoxication from hashish (chira, charas) smoking*

Mental troubles. These are similar to those noted in eaters of illicit preparations having a hemp resin base (dawamesk or majoun type, etc.)

This form of chronic intoxication is much more serious and brings on infinitely more harmful disorders than the smoking of raw hemp.

Several special studies of it have been made; as regards Turkey by Dr. Hassan Racine (*"Notes sur le Hachich"*, Montpellier Médical, 1876); as regards Egypt by Dr. A. Marie, assisted by Dr. Warlock, then Director of the Abbassieh asylum (*Notes sur la Folie hachichique"—Nouvelle Iconographie de la Salpêtrière*, No. 3, 1907); as regards Tunis by Dr. Perrussel[22]. (See document 1542 O., p. 27, and the annual reports of the Central Narcotics Intelligence Bureau).** The most striking symptom in victims of this drug is the intensity of the delirium and the hallucinations—of sight, hearing, taste and smell. The idea that the victim is possessed by a demon or spirit and persecution mania are common. In their delirious imagination, some addicts believe themselves to be sultans, prophets or famous conquerors.

At a later stage of chronic intoxication, the most striking phenomenon is a characteristic state of mental confusion; the two predominating symptoms are intellectual torpor and continuous dreaminess.

An addict will remain for hours in a state of the most complete mental inertia, indifferent to everything

* It should not be forgotten that apart from any question of mental debility, the North African native has a marked propensity to violent psychopathic outbursts and crises of self-excitement brought on by the most trivial, or at any rate, disproportionate causes. Professor A. Porot has drawn attention to these curious natural disorders for which he has suggested the descriptive term *"excito-motor crises of the native"*.

** See also Prof. Mazhar Osman Uzman,[52 bis] Prof. A. Porot,[56] Dr. P. O. Wolff[52 bis] and Dr. Céaux.[61]

and verging on stupidity. His mental unawareness is absolute: he is as unconscious of his surroundings as of his position. All general activity vanishes and facial movements cease. The powers of perception are dulled. The victim hides himeslf away like a wild animal, apart from human society, unconscious of all that is happening around him.

As a general rule, this state of confusion ceases abruptly with a sort of brutal awakening, leaving in its wake delirious sequelae, a sort of agitated condition of anxiety and uneasiness. That is the time when addicts of this kind are most dangerous; their susceptibility is intense: a simple affirmation, or the slightest contradiction, may rouse them to fury, jealousy or threats of violence. Nor need a third party be present to bring on a fit of aggressiveness. The hashish addict is subject to auto-suggestion and after some careless remark is apt to commit acts of violence without any apparent reason. It is also obvious that at this stage his suggestibility is very intense and he may then, at the instigation of others, become an extremely dangerous—even though irresponsible—instrument.

Physical effects. The somatic disorders found in hashish-smoking addicts are similar to those noted in raw hemp smokers; but their development is more rapid, and often leads to generalized tremor with difficulties of locomotion and cachectic emaciation.

It is hashish addicts of this type who usually end in mental asylums, as maniacs or cases of dementia praecox or schizophrenia.

In the former case a few weeks or months of calming treatment, accompanied by extra feeding and withdrawal of the drug, will improve their condition. Generally, however, they slip back into their vicious habits as soon as they have left the hospital.

With hashish dementia or schizophrenia the outlook is more sombre: mental and physical disintegration go hand in hand. This rapid sequence terminates, after a few months, in death in a state of dotage and marasma.

It has been explained above that eaters of mixtures compounded of hemp resin and aphrodisiacs (of the dawamesk, garawich or majoun type, etc.) are subject to crises of an erotic character: their state of sexual excitement may reveal itself in the various forms of offences against morals, such as exhibitionism, rape, etc. The same erotic tendencies have been noted in smokers of raw hemp and hashish—*but particularly in cases where addiction is quite recent*—for custom brings on anaphrodisia and sexual impotence. This undoubted eroticism of hashish-smoking beginners may possibly be the explanation of the numerous attempts at rape reported from the United States as attributable to marihuana smokers.

Note. In connexion with cannabis intoxication, attention should be drawn to a very controversial work: *The Marihuana Myth* by Dr. Leopold Salazar Viniegra, of the Mexican Public Health Service (October, 1938).

This writer maintains that cannabis has no dangerous effects from the mental standpoint. Subjects displaying some signs of mental disturbance under the action of the drug are either cases of dementia praecox or mentally deficient, or general paralytics. Cannabis causes no mental disorder in healthy and normal subjects: experience reveals only slight physical disturbances. Cannabis has no influence on the development of criminal tendencies.

The appearance (and assessment) of mental effects attributed to marihuana are the result of auto-suggestion, and that is why they are only found in educated persons steeped in the literature on the effects of hemp. Ordinary people, on the other hand, in their simplicity, regard cannabis merely as a harmless substitute for tobacco: they are satisfied with two or three cigarettes or cigars a day, made of tobacco mixed with marihuana; from the social point of view, therefore, the offence of hemp addiction is a myth which should be struck out from the penal codes. All the writers who have dealt with cannabis are the victims of *collective suggestion* of literary origin, for which Moreau of Tours, Baudelaire, Richet, etc., are responsible. The phenomena described by them exist only in their imaginations.

Drs. S. Allentuck and K. M. Bowmann (*American Journal of Psychiatry:* 99, p. 248, 1942) also say that no permanent harmful result is observed after the administration of cannabis. They propose its utilization to alleviate the effects of weaning opium and morphine addicts.

It seems desirable, however, to avoid trying to cure a drug addict with another habit-forming drug.

Allentuck and Bowmann's view has been strenuously opposed by J. Bouquet (*Journal of the American Medical Association,* 1 April 1944) and P. O. Wolff (The treatment of drug addictions). Neither is in favour of the use of marihuana in the treatment of other drug addictions. (See also Kolb, *American Journal of Psychiatry:* No. 99, 1942.)

IV. Problems of Hashish Intoxication

A. Extent of Hashish Addiction

It has been established beyond dispute that the use of cannabis to induce a special form of intoxication is of Asian origin. Europe and the Far East have as yet been but slightly contaminated. This practice has, however, gradually spread all around the eastern end of the Mediterranean and the areas along the southern coast as far as the Atlantic.

The east coast of Africa has not escaped, and the drug has penetrated progressively from the coast to the centre of the continent, where it at present constitutes a danger

which is difficult to check. It has also reached America (Jamaica, Brazil, Mexico, and, more recently, the United States and Canada), where its abuse is causing considerable alarm to the various Governments.

The problem of cannabis is not at present of outstanding importance for Europe. Although in the past the plant was grown openly or secretly for the production of narcotic resin in the Balkan countries (Bulgaria, Greece, Romania, Turkey and Yugoslavia), the Governments concerned have since passed measures of prohibition and are making commendable efforts to trace and destroy whatever secret plantations may exist. This does not mean that consumers of the drug have completely disappeared from those countries. Clandestine consumption still exists among certain sections of the population in Turkey, Bulgaria, and Greece. In recent years, clandestine cultivation of hashish has been discovered in the neighbourhood of Paris (Orly, Aubervilliers, Le Bourget). See [63].

In Asia, the cradle of hashish intoxication, the question is more complicated. For one thing, there are vast regions which are still beyond the reach of investigation (Sinkiang and Tibet, for instance). Other countries have not yet adopted measures of supervision or prohibition (e.g. Iran).* In other districts cannabis grows wild, and this circumstance might well defeat all attempts at control (this is the case in Siam, Burma, etc.). In India, which is largely contaminated, there is strict control, but the plant easily grows wild and clandestine crops are not rare. The same doubtless applies to Syria, Lebanon, Asiatic Turkey, and the Asiatic territories of the Union of Soviet Socialist Republics.

As for the existence of cannabis addicts, it appears that, with the *possible* exception of Japan, China, and the Siberian territories which cover all the north of the Asiatic continent, there is no country in Asia without devotees of the drug.

As for North Africa, in Tunisia and French Morocco, the system of controlled sales has been adopted. In Algeria and Egypt there is prohibition. The authorities of these various countries are nevertheless obliged to search for clandestine crops and to keep a close watch on contraband. Libya seems to be practically free from cannabis addiction.

All the other parts of Africa are more or less contaminated,** although in most of them the use of the drug is prohibited (cultivation is controlled in the Union of South Africa); but cannabis grows wild in many areas, and there are numerous illicit crops which are difficult to discover and destroy, because they are deliberately scattered about in districts to which access is almost impossible. The Egyptian Government has been obliged to use air patrols to spot clandestine crops.

In Oceania, cannabis does not appear to be used as a drug of addiction.

In America, hemp grows wild in the United States, Mexico and the Panama Canal Zone; illicit crops have been reported in the United States, Mexico, Brazil, the northern part of South America, Honduras, Jamaica and the Panama Canal Zone. All the American States prohibit the keeping and consumption of hemp. Addicts are to be found, however, in Canada, the United States, Mexico, Brazil, Cuba, the northern part of South America, Honduras, Jamaica, Dutch Guiana, Trinidad and Tobago, the Panama Canal Zone and Argentina.

According to P. O. Wolff[62 bis], there was already an old focus of cannabis consumption in the north and north-east of Brazil, where there are many negroes of African origin (states of Para, Maranhao, Piani, Rio Grande del Norte, Pernambuco).

Hemp grows there in the wild state. Hemp smokers belong to the lower classes of the population, especially negroes and half-castes. The custom of smoking in groups is said to be in obedience to the religious rites of secret societies.

Marihuana is smoked in common in pipes similar to the hookah or in cigars made of maize straw. In general individual cigarettes are preferred.

In Brazil, certain beverages (infusion, decoction of cannabis) are absorbed at various religious ceremonies which seem to be connected with magic practices.

In Mexico, clandestine cultivation is flourishing, and there is a big illicit export to the United States and Cuba. Mexican cannabis is said to be more active and richer in resin than that grown in Cuba.

It was reported at the first Pan-American Congress of Legal Medicine and Criminology (Havana, September 1946) that 70 to 80 per cent of Cuban addicts were marihuana addicts.

In Cuba smokers use the *chichara* (from the Arabic *chicha*, a pipe); they hold the stem between two fingers, which become impregnated with resin and thus produce a brown colour which can be detected by chemical examination. The habitual use of the hemp cigarette (*pito*) also produces the tell-tale stains (Dr. Luis Angulo)[71].

In Argentina and Colombia drug addiction through hemp has been reported chiefly since 1946.

In Ecuador, Nicaragua, Honduras and El Salvador this vice appears to have been introduced since the war.

* According to reports of the Iranian Government in 1932 (see O.C. 1542, p. 39), the hemp cultivated in most parts of the country does not grow very high, has many branches, and cannot be used for fibre. These are the characteristics of resin-producing hemp. Tall cannabis plants producing textile fibre are obtained only in certain districts of the Caspian Sea and at Kerman.

** See Dr. A. O. Cureau, *Les sociétés primitives de l'Afrique équatoriale*, Paris, A. Colin, 1912, pp. 268 and 281.

B. Causes of Cannabis Addiction

From this enumeration, it may be concluded that a considerable fraction of the world's population (the figure of 200 million persons has been mentioned) indulges in the consumption of hemp as an inebriant. An attempt may now be made to describe the type of men more particularly attracted by the mirages of these artificial paradises, and the motives which drive them to seek joy and happiness in this drug.

1. *India*

The practice of taking hemp to induce a special form of intoxication appears to have originated in India. It is therefore normal to start with that part of the world when studying such practices. A note addressed to Dr. J. Bouquet in 1912 by Mr. D. Prain[28], Superintendent of the Royal Botanical Garden of Calcutta, gives a clear résumé of the question:

HEMP IS USED IN INDIA:
For smoking (ganja and charas)
As a supplement to food (like tea, cola, etc.):

By poor people who find it a salutary means of resisting fatigue or the effects of lack of food. Its use in this case does not cause any physical or moral disorder.

As an inebriant and substance-like opium provoking cerebral hyperesthesia:

By idle persons in order to intoxicate themselves; by vicious persons to enable them to concentrate their minds on unhealthy thoughts; and by fanatics to intensify their mysticism.

Its use in this case becomes pernicious through excess. The symptoms develop rapidly and in their most serious form if opium and datura are added to the drug, as is frequently the case.

For drinking (bhang) *and for eating* (majun)
As an intoxicant like alcoholic drinks:

By idle persons in order to intoxicate themselves; by depraved persons as a stimulant (in this case nux vomica and cantharides are added to the drug); by criminals to obtain the courage to execute the designs they have conceived in cold blood.

Such use does no injury to the individual if not too frequent. In cases of excess, serious dyspepsia and decrease in vitality follow quickly.

By fanatics in general, without ulterior motives if they are Hindus, in order to commit acts of violence if they are Moslems.

As a stimulant of a particular kind:

Very frequently by people who, without being real hemp addicts, indulge in this debauchery under the influence of an abnormal moral state, hatred or lust.

Many persons take hemp in all three forms.

R. N. Chopra and Cr. S. Chopra[66] give as the principal causes of the habit of consuming cannabis: (*a*) instruction by other addicts; (*b*) religious factors; (*c*) the seeking of aphrodisiac and euphoric properties; (*d*) to replace opium, alcohol or other drugs which have become unobtainable; (*e*) illnesses or indispositions; (*f*) arduous work, worry, over-work; (*g*) miscellaneous causes: curiosity, search for emotion, stimulation to courage and often rashness. Drug addicts generally start between twenty and thirty years of age; it is extremely rare to contract the habit before fifteen and after sixty years of age.

This short survey of the role of hemp in India is enough to show the dangerous and anti-social character of the drug.

2. *Moslem countries*

The use of hemp in religious rites in India finds no counterpart in the Islamic world. R. N. Chopra[66] points out, however, that in certain Moslem sects in India, cannabis is considered as the incarnation of the prophet Khizir Elijah, the patron saint of water. Its use is even supposed to be condemned by the precepts of Koranic law. Yet hashish is the oldest known drug in Turkey. Until recent years it was the only substance smoked. (In Moslem countries opium is *eaten and not smoked*). That is why its use is so widespread, especially among the poorer classes. (See O.C. 1542, p. 26.) In French North Africa and Egypt, the practice of consuming hemp has been current for many hundreds of years.* What motives impel the Moslem natives of those regions to indulge in this practice?

The motives are practically the same as in India, except for the desire to intensify religious mysticism.** Their primary object was originally to stimulate their sexual faculties, weakened by excess.

It must be remembered that these are tradition- and routine-bound populations, and that the mental outlook of at least 80 per cent of them is five or six centuries behind that of Europeans. They still believe in a healing lore similar to that which existed in Europe in the Middle Ages. Drugs like cannabis and opium are popularly reputed among such peoples to be powerful aphrodisiacs. Oral tradition has repeated and spread these errors, which also appear in most of the popular medical treatises, thereby acquiring the prestige of the written word. That is quite enough to render useless the exhortations and advice which these unfortunate people may receive from Europeans or educated and enlightened fellow-citizens.

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* It is a curious thing that Tripolitania and Cyrenaica, although long occupied by Turkish garrisons, and situated between two countries (Egypt and Tunisia) which are badly contaminated, appear to be practically free from cannabism. An inquiry carried out by Dr. Bouquet on this subject among a number of natives of Tripolitanian origin showed that there was very little hemp consumption in their native country. Dr. Bouquet recently obtained confirmation of this statement from M. Buffaiterille, acting French Vice-Consul in Tripoli, and from Prof. N. Tripodi, the doctor in charge of the Colonial Hospital at Tripoli.

** According to J. Deniker (*"Les races et les peuples de la terre"*, p. 573), a kind of hemp-worship (Riamba-worship) exists among the African Ba-Louba. They regard hemp as a divinity; all hemp-smokers call themselves brothers, owe each other hospitality, agree not to sell their daughters to each other, etc. Similar conceptions in South America. (See P. O. Wolff[66bis].)

If the annual reports of the Central Narcotics Intelligence Bureau of the Egyptian Government are consulted, it will be found that the doctors who have attempted to analyse the causes of the various forms of drug addiction in Egypt are unanimous in recognizing that the natives take drugs in the hope that they will enable them to increase, maintain, or regenerate their sexual powers. For examples see the following remarks in the 1929 report: Dr. H. W. Dudgeon, page 57, "Actually the great majority of cases especially in this country start taking drugs for sexual stimulation . . ."; Dr. Whitcomb, page 73: "the causes given for addiction are to be a 'good fellow' and as an aphrodisiac . . ."; Dr. Ackren, page 73: "The most common cause is the aphrodisiac effects of these drugs"—a statement which is repeated by the same doctor in the 1930 report on page 59. On page 60 of the same report Dr. Takla states: "The commonest cause of drug addiction is the belief that drugs prolong the sexual powers in sexual intercourse". Similar statements are made in the 1931 report, pages 106, 114, 116, 117 and 118, and in the 1934 report, page 55. Similarly, in the 1933 report, page 69, it is stated that "In Egypt it can be said that 90 per cent of addicts have been intentional addicts but that the reason that these thousands of people took to drugs was that they believed them to be a potent sex-stimulant". In League of Nations document O.C.1542 (d), it is stated (page 6) that hashish is most always used as an aphrodisiac in Egypt.*

Sir Thomas Russell, then Director of the Egyptian Narcotics Bureau, was of the opinion that the recrudescence of addiction should be ascribed to the increase in the Nile Valley of certain parasitical diseases (such as malaria, bilharziasis, and ancylostomiasis)—an increase due to modern changes in the system of irrigating cultivable land. These diseases apparently reduce the fellahin to a condition in which they have less capacity for work and less endurance. The agricultural workers, finding their physical strength and virility decreasing, in their ignorance sought a stimulant in order to recover their lost vigour "which forms part of their code of honour". That is why, according to Sir Thomas, the practice of taking hashish, and subsequently manufactured drugs, spread.

The above view is not shared by Dr. J. Bouquet (see League of Nations document O.C. 1724, Add., p. 25 and the Minutes of the 1938 meetings of the Sub-Committee on Cannabis), who considers that there is no connexion between the health and epidemiological conditions of a district and the spread of various forms of drug addiction, and that in the Islamic world the passion for drugs has been a deep-rooted vice for many centuries.

In North Africa, at any rate, the investigations carried out have shown that the natives do not take to drugs in order to invigorate their systems when weakened by overwork and disease. It is primarily in the hope of restoring their virility, which has become impaired by sexual excesses, and secondly, in order to be able to lead in imagination the life which they would like to live, but which their indolence and love of ease in most cases prevents them from attaining by work, forethought and persevering effort.

It is obvious that many more inquiries must be carried out if conclusions are to be reached which will be valid for all the populations of the Old World contaminated by cannabis.

3. *America*

In America the use of cannabis seems to have been introduced much more recently.** It appears, however, that hemp was known in Mexico before the Conquest, and that intoxication by that plant formed part of certain religious rites and ceremonies practised by the aborigines. Dr. Livet (*Les Fumeurs de Marihuana—Annales médico-psychologiques,* Paris 1920, p. 257) describes certain ceremonies of a religious character among the Indian tribes. Hemp is smoked mixed with tobacco in the form of cigars. A cigar is passed from smoker to smoker until the characteristic symptoms of intoxication appear. He refers to the curious practice of putting in the middle of the place where the meeting is held a small saurian (an iguana) who serves as a control animal. When the animal collapses, overcome by the smoke in the atmosphere, those present must stop smoking, for fear of an intoxication which is reputed to be fatal.

In Mexico—apart from these tribes among which cannabis seems to form part of ancient religious rites—the drug (although prohibited) is grown secretly and consumed by the lowest class of the population. The United States Government ascribes the introduction of marihuana into the United States to Mexican workmen employed as seasonal labour in certain states of the Union.**

Public opinion and the authorities have become alarmed at the spread of this form of addiction, which increased enormously after the prohibition of alcohol, and spread especially among the younger generation of the Latin-American population, Mexican, Philippine, Greek and Spanish immigrant circles, and negroes. Habitual hemp smokers in the United States (no case of addiction through oral ingestion has yet been reported)

* Same note for India in R. N. Chopra and Cr. S. Chopra[66].

** Introduced into New Orleans towards 1910[20].

*** According to "How mild is Marihuana" by A. Essati (*Magazine Digest,* Toronto, Ontario, 1944) the chief names designating marihuana among traffickers and drug addicts in America are: muggles, mooters, reefers, greefe, griffs, Mary Warner, Mary Weaver, Mary Jeanne, Indian Hay, Loco weed, Love weed, Jay smoke, giggle smoke, Bambalacha, Mohasty, Mu, Moocah, grass, tea. In Mexico the slang words are: Juanita, Dona Juanita, Maria Johanna, Rose Maria. In Cuba: la Hierba, la Mota, la Bareta.

constitute a most serious problem for the police authorities, for it has been found that among the contaminated elements of the population the abuse of the drug produces an unfortunate propensity to violence, and even to crime.*

Similar facts have been observed in Jamaica, where the practice of smoking hemp, introduced by immigrant Hindus, has spread among the population and has been the underlying cause of a large number of cases of assault and even murders. The same applies to Cuba (see Dr. Luis Angulo[71] and Dr. G. Lage[70].).

Similarly, the Government of Canada (see O.C. 1542) has stressed the fact that the introduction of cannabis addiction is of recent date, towards 1930, and that its principal victims are young people; as in the United States, the hemp appears to render those under its influence violent and brutal.

This effect of cannabis is different from that generally found among oriental addicts.

This is perhaps a question of racial susceptibility. The investigations of Stringaris[33] and Sinkarenko[36] showed that the consumption of drugs derived from cannabis had spread in Asiatic Russia in the territories north of the Caucasus and certain districts of the Volga Basin. According to these authors, there, as in North America, a large proportion of criminals (60 per cent) were addicts.

On the other hand, among Europeans living in North Africa, and belonging for the most part to the Latin Mediterranean group (Spaniards, Italians, Maltese, Greeks and French) there is little or no cannabis addiction, although the drug is easy to obtain. It does not appeal to them. In fact, the few Europeans who have had a fancy to try hemp do not appear to have been driven to commit violent anti-social acts whilst under the influence of the drug.

Another hypothesis suggests itself, namely that the resin produced by the cannabis growing in America may have a different composition, and hence different physiological properties, from that coming from the East or from North Africa; but this supposition can scarcely be entertained, for the American resin reacts to identification tests in exactly the same way as that from other producing countries. Nevertheless, research is necessary, to elucidate the problem completely.

* * * * *

* Captain Eli Markovitz and Captain H. J. Myers have studied (The Marihuana addicts in the army, *War Medicine*, December 1944, pp. 382-394) a certain number of soldiers in the American army, especially coloured men, who were addicted to the use of marihuana.

Efforts to treat them were vain, and despite long stretches in the guard room, these men, as soon as they were released, immediately relapsed into their vice, and finally had to be dismissed from the army. This is not a solution, since the addict is simply transferred to civilian life where his vice will determine criminal and anti-social behaviour. (See P. O. Wolff[33 ter].)

C. Social Aspects of Hashish Addiction

In the present state of the somewhat disconnected body of evidence which has been collected, it is not yet possible to draw up a table applicable to chronic hashish addicts as a whole. For the time being, all that can be done is to give a brief description of drug addicts in the Levant and North Africa, these being the addicts of whom we know most, although there are still a number of obscure points.

Is it, for instance, true that only the lower classes of the population are contaminated by this vice? That appears to be the opinion of most writers who have dealt with the question. Dr. J. Bouquet, however, thinks that such an assertion is the result of inevitably superficial observation, and that as far as North Africa is concerned—leaving aside the question of proportion—the middle classes and native bourgeoisie cannot be said to be free from the vice. The same doubtless applies to Egypt and Turkey. An Afghan or Mexican travelling in certain European countries and judging by the drunkards whom he meets staggering along the public highway, would feel justified in asserting that drunkenness is prevalent only in the poorer classes; but he would be wrong. In the East, the foreigner readily notices poor people, a kif pipe between their lips, squatting or lying down on mats in some corner of a souk, at the entrance of a small shop, or in the shade of a Moorish cafe. The more prosperous hashish addict has no need to exhibit his vice in public. It is in his own house, sheltered from prying eyes and from any possible police supervision, that he gathers his friends around him to indulge in the drug.

It is perhaps true that there are fewer hemp smokers in the well-to-do classes than among the lowest strata of the population. But the former certainly contain a much higher proportion of persons consuming preparations made from cannabis (dawamesk, garaouich, majun, etc.). These mixtures sold in the illicit traffic are luxury articles, and always expensive; they are in most cases beyond the means of the poorer addicts. Who then consumes them, if not the well-to-do? Dr. Gobert[22] reports, moreover, that many Tunisian bourgeois are not averse to indulging in hemp, at any rate during the month of the Fast of Ramadan; and Dr. Guèche[51] notes that in Algeria the great majority of hemp consumers are illiterate, but that quite a number of educated people also consume the drug.

In any case, as these circles are reserved and resentful of intrusion, and hence very difficult to approach, present indications are no more than conjectures, to be confirmed or disproved by subsequent investigation.

The cannabis smoking populace, on the other hand, is easier to study. Throughout the whole of the Moslem East it forms a kind of cheerful irresponsible rabble which makes no secret of its vice, particularly in coun-

tries such as Tunisia and Morocco, where the use of hemp in its natural state is not forbidden.*

1. *Class from which addicts are recruited*

In North Africa, hemp smokers are not recruited from the tent-dwelling nomadic Arabs who live in the steppes and fringes of the desert. The vice is rare among the farming population, who live grouped in "douars" in the cultivated or stock-raising districts. Tea addiction finds greater favour with them.**

It is among the sedentary dwellers in the oases and the lower classes in the towns (artisans, labourers, coachmen, small shopkeepers, boatmen, porters, dockers, etc.) that the largest number of hemp consumers are found. Many of such people (except perhaps the artisans and small shopkeepers) indulge, even to excess, in alcoholic liquor. There is no doubt that drunkenness has spread—at the expense of hemp—to the majority of those whose occupations bring them into continuous contact with working companions of European origin, of the lower class. In the port of Tunis, some dock workers, earning 350 francs daily, drink 4 to 5 litres of wine a day, apart from numerous "aperitifs", and smoke takrouri in the evening. They scarcely have enough left for meagre meals and do not even manage to dress decently.

A Moroccan proverb says "Kif is like fire; a little warms, a great deal burns". Many consumers are therefore content to smoke a few pipes every evening while sipping coffee or a cup of tea, before going to bed. It can be said that cannabism has no serious effects on this type of person. Their health will not suffer and they will be able to carry on their work without difficulty. The number of these "careful" smokers is fairly high in the towns among the artisans and small shopkeepers.

Those over whom the drug has a greater hold meet in the evening in groups of five or six in their favourite cafés or in a shop belonging to one of their number.*** Sometimes, if they can afford it, they hire premises, generally a single room, in a side street or quiet dead-end. The furniture is scanty: mats or cushions on the ground or on benches, a few coloured prints on the walls, and a low table with a jar of basil (*Ocimum basilicum*), the perfume of which is much appreciated by the natives; they always bring with them either candied fruit or some pastries and sweets, including sometimes a kind of "majun" which they prepare by merely mixing powdered hemp with hot thick syrup. The mixture is poured out on to a marble slab, where it solidifies. It is then cut into pieces. A clay stove (canoun) is used for preparing coffee or tea: fresh mint leaves (nana) are often added to the latter.

The meetings generally last a long time, as it is customary to attain complete intoxication. The smoking den is therefore left very late in the night, if indeed the stage of sleep which closes the cycle of the phenomena of intoxication does not compel the smoker to stay all night. It is easy to imagine that nights thus passed do not predispose to work on the morrow.

2. *Consequences*

The drug habit develops in its devotees various tendencies, some innocent, others definitely anti-social, which distinguish them from their fellow citizens. Finding no satisfactory outlet for such tendencies in normal society, they band together to form a somewhat disquieting fraternity.

Those in whom addiction has not yet reached an advanced stage are observed to have a pronounced taste for flowers, perfumes, sweets and singing birds—in fact, feminine tastes, which accord fairly well with their temperament of inverts. They still dress with a certain amount of taste, and are fond of clothes with loud colours.

Inveterate addicts, however, generally not only pay no attention to their persons, but neglect the elementary rules of cleanliness. Their appearance is disorderly and dirty, they are content with a filthy hovel as a lodging, or may even sleep in the open or in some mucky stable corner. Frequently, they no longer trouble to prepare food, but beg at the doors of barracks or charitable institutions (popular soup kitchens, etc.). The little money they have is spent in buying the drug. Impervious to any sense of shame or dishonour, they do not shrink from the most unprincipled and degrading acts to procure funds. They have no feelings left except to be sorry for themselves and invariably throw the blame on others.

The majority of hemp smokers are bad Moslems. They are much more superstitious than pious. They neglect the observance of prayers, and yet a certain number carry out pilgrimages to the tombs of various marabouts. They claim, moreover, that many of the most popular saints of Islam indulged in kif.

Such people are an unproductive burden on society. What little property they have is soon disposed of to provide them with means of buying the drug. If they practise a trade they neglect their professional duties, and poverty soon follows. They do not care, however, and have indeed no hesitation in selling what little furniture or clothing they possess. If they are married, if they have children, they soon become incapable of providing for their families, and abandon them without a qualm to the direst poverty. If single, they refuse to marry and are content to live wretchedly as old bach-

* Prof. A. Porot[86 bis] and Prof. Mazhar Osman Uzman[86 bis] stress the frequent association between cannabism and alcoholism; and also the retreat of hashish addiction before the invasion of manufactured drugs, especially heroin.

** See J. Bouquet: *Le Thé ïsme en Afrique du Nord*, 1948[21g].

*** Same observation as regards Cuba and groups of smokers (*bonches*) of marihuana cigarettes. See Dr. Luis Angulo[71].

elors between their pipe and their stewpot,* spending every penny on the drug. And who benefits by the money thus spent? The State gets nothing from it (except where it has a monopoly of the sale of the drug). It goes to fill the pockets of the crowd of illicit traffickers and smugglers. It is a mistake to imagine that the amounts involved are small. The 1929 report of the Central Narcotics Intelligence Bureau of Egypt estimated an addict's daily average expenditure on hashish at five Egyptian piastres. As the number of smokers in the country at that time was calculated to be approximately 250,000, that expenditure represents £E.4,562,500 a year, which not only contributes nothing to the prosperity of the community, but impoverishes it, as the money goes into the pockets of traffickers who are mostly not citizens of the country where they carry on their nefarious traffic.

Nor is this all. A large proportion of the addicts who do little or no work, take insufficient nourishment, and live in deplorable hygienic conditions, account for a considerable proportion of the patients admitted to the hospitals from time to time. Whilst a burden on the public relief institutions when ill, they are also often a charge on the penitentiary institutions, for stealing to obtain funds and their other offences frequently take them to gaol. The healthy industrious sections of the population are obliged to defray the additional expense of supporting this scum of humanity.

It is impossible at present to calculate the extent of such expense in most of the countries where there are cannabis addicts. There are no statistics for Turkey, Tunisia or Morocco.** The only available details are provided in the annual reports of the Egyptian Central Narcotics Intelligence Bureau. The 1937 report states that for a population of 3,110,694 males between twenty and fifty-nine years of age the hashish consumers can be estimated at 11,552 for 1934, 10,503 for 1935, 6,075 for 1936 and 6,524 for 1937. These figures are impressive and give cause for anxiety. If it were possible to estimate exactly what the maintenance of such addicts cost in the State budget (assistance given by charitable societies, hospital expenses, and terms of imprisonment) and to add like expenses connected with addicts taking other drugs (opium, heroin, cocaine, etc.), the total would be startling.

It must not be thought that the many addicts who attend the hospital out-patient departments are actuated by a desire to reform. The kind of life they lead and the undernourishment they endure, together with the physiological debilitation caused by abuse of the drug, bring on many diseases: broncho-pulmonary afflictions in winter and entero-gastric ailments in summer, not to mention syphilitic lesions, which are fairly common.

In the majority of cases, if it is possible to cure the ailment for which they were admitted to hospital, regular and plentiful food and temporary abstention from the drug result in rapid recovery.

Unfortunately, it is exceptional for them not to relapse into their vice as soon as they leave hospital. During their time in hospital nothing is learned, as a rule, of their addiction; firstly because they themselves do not reveal it, and secondly because the subordinate nursing staff, although in permanent contact with them, consists of natives, who attach no importance to the vice and do not report it. Moreover, the laboratory tests so far carried out do not reveal any special signs pointing to cannabis addiction. Lowered blood pressure, the presence in the urine of glucose (frequently), or of glycuronic acid (two cases) are such common symptoms that they are of no value for the purpose of diagnosing addiction (Dr. J. Bouquet)***: there has not yet been any systematic research on the blood. Another reason why the detection of this class of addict is difficult is that they do not show any of those withdrawal symptoms which are so characteristic in the case of opium addicts and consumers of manufactured drugs that they cannot pass unnoticed. According to Chopra[66], deprivation of bhang does not seem to cause any ill effects. Forced deprivation of ganja or charas sometimes causes disagreeable symptoms, but nothing like those caused by the lack of manufactured drugs.

Thus it is extremely difficult to discover such addicts, unless they give themselves away by some reprehensible act during, or as a result of, a bout of cannabis intoxication, or are caught red-handed holding or consuming a prohibited drug (e.g. chira in North Africa).

The result is that chronic intoxication may follow its course, grow worse with time, and reduce the sufferer to mental epilepsy, hashish mania, or schizophrenia which calls for internment in a lunatic asylum.

There are unfortunately few statistics available concerning the number of interned hashish addicts.

Some figures furnished by Dr. Warnock[53] may give an idea—though only a very rough idea—of the proportion of cases of hashish insanity occurring in Cairo from 1895 to 1901. The number for that period was 689 out of 2,564 insane persons of the male sex, or 27 per cent. In 1902, at the Abbasieh asylum (Egypt), 22.5 per cent of the inmates were hashish consumers; in 1903, 18 per cent, in 1904, 15 per cent, in 1905, 14.5 per cent and in 1906, 12 per cent.

* In October 1938 in the Nefzaou (Tozeur, Nefta), where the numerous smokers of takrouri are so little ashamed of their addiction that they go about with their kif pipe stuck in the folds of their turbans, one of them confessed to Dr. J. Bouquet to smoking 80 to 100 pipes a day, and so exhausting his resources in purchasing the drug that he was frequently left without money to buy food. Although a young man, he declared that he did not want to marry (which is ignominious for a Moslem) so as to be able to devote all his daily earnings to the purchase of hemp and tea.

** Sir R. N. Chopra estimates the number of hashish addicts at about 1,500,000 in India; but this estimate does not include illicit consumption, which is impossible to ascertain.

*** See Dr. G. Lage[70]. He mentions certain laboratory research on hashish addicts.

It should be noted that in Egypt insanity is three times more common among men, for they consume opium or hashish, than among women, who are but rarely addicted to these two drugs. That proportion is very significant, when it is remembered that in Europe insanity is more frequent among women than among men.

Some old statistics of persons interned in the asylums of Bengal on account of hemp addiction give the figure of 53 per cent for 1891-92. In 1901, according to Lewin[54], of 232 cases admitted, seventy-six, or roughly 33 per cent, were cases of insanity due to cannabis. In the Punjab asylum, in 1905, of 567 persons interned, ninety-eight were hashish addicts and nineteen both hashish and opium addicts. Of that number, seventy-five (three of whom were interned in the asylum after committing a crime) were victims of charas (hashish, chira), two of ganja, and twenty-one of preparations for eating. (Official Statistics of Asylums in India). Cases of insanity have also been reported in Siam. In addition, in many cases, the narcotic is added to alcohol.*

In Tunisia, during the year 1925, Dr. Perrussel[22] removed to hospital 119 insane persons (ninety-two men and twenty-seven women). There was no drug addict among the women. The number of hashish addicts among the ninety-two men was thirty-two (i.e., more than a third); it included sixteen smokers of takrouri (chopped hemp), and sixteen smokers of chira, all seriously affected. At present the number of persons interned for hashish addiction in Tunisia is very small (one, in 1937). Unfortunately victims of manufactured drugs have taken their place.

D. Cannabism in Relation to Other Addictions

If studied superficially, these various statistics, although very fragmentary, would lead one to suppose that the number of consumers of cannabis, or at any rate of those consuming it in excess, is decreasing; but the real question is whether in most places, save India, hemp addiction has not been supplanted by addiction to manufactured drugs.

In 1932, Sir Thomas Russell[48] write in the *Annual Report of the Narcotics Intelligence Bureau:* "True, hashish is not the same menace as heroin, but hashish addiction leads to heroin addiction."

The same view is held by Stringaris[33], Meyerhof[34], and J. Bouquet. While in Egypt the number of hashish addicts fell from 11,552 in 1934 to 6,524 in 1937, the same statistics show that the number of persons found guilty of consuming heroin rose from 1,605 in 1934 to 2,602 in 1937. The same warning note is sounded by Dr. J. Bouquet with regard to Tunisia. There are fewer hemp addicts there than formerly, chiefly because the number of new recruits to the ranks of cannabis addicts has been declining regularly, partly owing to the increase in alcoholism, and partly because the younger element of the population is attracted by heroin rather than hemp.

How is the popularity of manufactured drugs to be explained?

Dr. J. Bouquet considers that one of the main reasons is the abundant supply. Contraband in hemp and hashish (chira, charas) is less paying and more difficult than illicit traffic in chemical drugs. The big traffickers therefore devote all their efforts to trading in the latter substances, and their numerous retailing agents, deriving greater profit from the transactions (a profit which is notably increased by the facility with which the drug can be adulterated) do all they can to recruit and enlarge the circle of their customers. Their solicitations are so numerous and persistent that the victims have little chance of escape.

1. Substitute drugs

In North Africa, persons accustomed to hemp who have allowed themselves to be persuaded to take manufactured drugs, sometimes return to cannabis, either because the habit is deep-rooted or because they cannot procure supplies of the new drug. In most cases they alternate between one and the other according to the possibilities of supply.

On the other hand, people who start by taking chemical drugs do not turn to cannabis when they have run out of their favourite drug. They find that hemp is not sufficiently swift or powerful in its effects to satisfy their vice. The chief substitute which they try to get is opium (which they chew and do not smoke).

The same no doubt applies to Egypt; in fact the seizure statistics given in the 1937 report of the Cairo Central Narcotics Intelligence Bureau are as follows:

Hashish: 1934: 800 kg. 842 g.; 1936: 448 kg. 955 g.

Heroin: 1934: 14 kg. 739 g.; 1936: 26 kg. 737 g.

Opium: 1934: 314 kg. 265 g.; 1936: 500 kg. 951 g.

The decline in hashish seizures corresponds to an increase in heroin and opium seizures. The Egyptian Government also stressed the fact that there had been an increase in clandestine cultivation of the opium poppy in Upper Egypt. While, owing to the efforts of the League of Nations and the United Nations, hashish has become definitely scarcer in Mediterranean districts, heroin has competed with it and, in part, supplanted it. The high price of the white drug and the intensification of the campaign against traffickers compel addicts to look for a substitute. If heroin remains scarce and its price is prohibitive for most of them, they will try to get opium rather than hashish.

* See report by Prof. A. Porot[52 bis], report by Prof. Mazhar Osman Uzman[56 bis] and work by Dr. Luis Angulo[71].

2. *Cannabism and crime*

The problem is certainly not the same in North America. There cannabis addiction is a "new vice", which has a special attraction for young people, particularly in the large cities. It also appears that marihuana smokers are recruited from people who formerly did not indulge either in heroin, morphine or cocaine. What is particularly alarming is the fact that the investigations of the Governments of the United States and Canada show cannabis to have a marked influence on criminality among such addicts.[68]

The same cannot be said about North Africa or the Levant.

There, at present at any rate, a large number of petty offenders (pilferers and thieves), some more serious offenders (assault and battery, minor acts of violence, and indecent assault), but very rarely persons guilty of more serious crimes, even attempted murder, are to be found among hemp consumers. It cannot therefore be said that cannabis addiction has an influence on criminality in the Moslem world at the present time; in North Africa nowadays there are perhaps more brawls, acts of violence, blows and wounds attributable to alcoholic liquor than to cannabis.

In any case, it would be premature to draw conclusions, and further investigations must be pursued in the various countries where there are hashish addicts. There may, moreover, be no direct connexion between drug addiction and criminality: each may arise from, and be explained by, a mental deficiency in the individual. (See O.C. 1542 (c) p. 10).

V. Supply

A. Volume and Extension

The clandestine trade in cannabis, its resin (charas, chira and hashish) and their preparations, is not nearly so widespread as the illicit traffic in manufactured drugs.

It has always been localized chiefly in the eastern Mediterranean basin, stretching out tentacles to the west towards Tunisia, Algeria and Morocco, to the south towards Egypt and the Sudan, and to the north towards certain parts of the USSR. In the last few years a clandestine trade, unconnected with that just mentioned, has been discovered in the United States.

On rare occasions large seizures have been reported in various western European countries; but they concerned consignments in transit to other parts of the world. The only consumers of the drug mentioned in the reports of the Governments of Great Britain, France and the Netherlands, are occasional groups of sailors or traders from India or Moslem countries, settled, for the most part only temporarily, in certain parts of western Europe. Such groups are not sufficiently numerous or large to interest traffickers.

Cannabis traffickers therefore direct their efforts primarily to other regions. Further, such countries must be sufficiently rich; that explains why traffickers pay special attention to Egypt, and that is what the United States has to fear.

It would be superfluous to study the traffickers' organizations, methods and ruses in detail. To acquire a perfect knowledge of them one merely has to refer to the excellent annual reports of the Narcotics Intelligence Bureau of Cairo, which have been published since 1929 by the Egyptian Government, and to the annual reports of the United States Bureau of Narcotics.

Sources

It will moreover be seen; if those reports and League documents O.C. 1542 and O.C. 1542 (k) are examined, that the efforts of the League of Nations had already given encouraging results. It is owing to them that the production of cannabis in the countries of the Balkan Peninsula has been practically stopped. Perhaps some illicit cultivation still goes on there, but not enough to constitute a serious danger. In Yugoslavia, in spite of the fact that they are forbidden by law, there appear still to be illicit crops in districts where opium is cultivated, particularly in the districts of Uskub, Guevgueli, Doiran, etc.* The Yugoslav Government probably put a stop to the cultivation in question as soon as it learned of it.

In Turkey the question is more complicated. In spite of laws and in spite of the sincere efforts of the Government, it cannot be denied that contraband, if not illicit cultivation, still exists. The "hashish of Brusa" has always enjoyed an excellent reputation in the world of hemp consumers. The preparation of, and trade in, this product, together with opium, were a source of considerable profit for part of the rural population of certain vilayets of Asia Minor. It is therefore probable that the peasants in question have not given up such a paying crop, and that illicit plantations, although more carefully concealed, still exist.

Secondly, owing to its geographical position, the Turkish Republic is the highway to the eastern Mediterranean for supplies of the drug which traffickers have been able to obtain in Iran (whether it originally comes from Afghanistan, Sinkiang or Iran itself). Therefore, in Turkey there are two currents of active contraband: one from the interior of the country towards, more particularly, the Moslem Mediterranean countries; the other from certain hemp-producing countries towards Turkey,

* In 1917-1918 Dr. Bouquet had an opportunity of seeing fairly large stocks of hashish in the hands of the peasants in the villages of Bohemitza, Karasouli, Mayadag and Gorgop (in the district south of Guevgueli). He was told that these stocks were generally sold in Salonica; but at that time the war was interrupting the trade.

which is able to consume a certain amount itself and to launch the rest into the illicit traffic.

Finally, it must not be forgotten that Istanbul has always been, and still is, the favourite port of hashish (and opium) smugglers. Not only can traffickers place consignments of hashish on steamers calling at Istanbul, but numerous coasting vessels, which are not easy to watch, leave that port to visit various places along the coast of Asia Minor, Palestine, Syria and Egypt.

However, it cannot be denied that the amounts of hashish seized have decreased since 1929, both in Egypt and in French North Africa. Thus, in Egypt hashish seizures in 1929 amounted to over 12,000 kilogrammes; those of manzul (a drug prepared for eating from hashish and spices) were about 240 kilogrammes; in 1937 the hashish seizures were less than 200 kilogrammes and those of manzul less than 20 kilogrammes.

The problem should, nevertheless, be examined more closely; and the trade in cannabis in its natural state, and that in its resin (charas, hashish, chira) should be studied separately.

1. *Hemp in its natural state for smoking*

(*a*) *Legal supplies*. The supply of this product is allowed in three countries only, namely India, Tunis and Morocco.

*India**:*

It should be noted that the British Government had always considered that it was neither practical nor desirable to depart from the traditional policy of tolerating the moderate use of raw opium and drugs with a hemp basis, while taking every possible step to prevent abuses.

Throughout the whole of India and Pakistan, cannabis in its natural state is consumed in the form of bhang (leaves) and ganja (female tops). The plant both grows wild and is cultivated. There is no government factory for the preparation of bhang and ganja; but cultivation of hemp and collection of the produce from the wild plant were subjected to a system of licences. The produce collected was stored in Government depots. It was issued, as and when requests were received, to licensed retailers under conditions very similar to those governing the sale of opium. Consumers obtained their supplies from shops belonging to these authorized merchants. The Indian Government has just announced (1950) that it proposes to prohibit the cultivation of cannabis for the purpose of obtaining ganja.

Illicit trade doubtless exists, as cannabis grows wild in many parts of India. There may also be clandestine crops which escape the attention of the control authorities. It is said that a considerable contraband trade is carried on with hemp from Assam.

There is an illicit export trade to Ceylon and certain parts of Arabia, the east coast of Africa and the Red Sea, where Indian ganja has a great reputation; but this traffic is not so large as that in charas (hashish).

Tunisia:

The sale of chopped hemp ready for smoking (takrouri) is a state monopoly like the sale of tobacco, salt, gunpowder and matches.

The *Direction des monopoles* every year fixes the area of authorized plantations and issues cultivation permits. It buys the complete crop of whole plants from the producers. The Tunis Tobacco Factory prepares takrouri, by cleaning, chopping and sifting. It divides it up into packets of five grammes which are sold, without any formalities, in all the tobacco shops of the Tunis Regency. In 1937, 6,387 kilogrammes of takrouri were sold, i.e. 1,277,400 packets, at 2 frs. 35 centimes each.**

Illicit trade. This is negligible, so far as illicit crops are concerned. In 1941 small plantations, representing a total of 2,161 plants, were discovered. There is no smuggling by sea, as the produce has not sufficient market value to be worth the sailors' while. Illicit importation is carried out chiefly across the Algerian land frontier (367 kg. were seized in 1937; 958 kg. in 1947). The attempts to introduce contraband hemp from Algeria are sufficiently numerous to justify the suspicion that there are cannabis plantations in Algeria, which are either clandestine or given out to be "for the production of textile fibre" (Dr. J. Bouquet). As the produce is bulky, cumbersome and difficult to conceal, this form of contraband, which is not very remunerative, does not attract the important traffickers' organizations. It is chiefly a matter of isolated attempts by low-class natives.

French Morocco:

In Morocco, the sale of chopped hemp ready for smoking (kif) is the monopoly of the *Société internationale pour la Régie coïntéressée des Tabacs*. As in Tunisia, the hemp is sold in tobacco shops, but mixed with tobacco.

The raw material is bought from the producers in Spanish Morocco. This method makes it possible to provide the consumer with a product to which he is accustomed, and also reduces the stocks which native producers woudd otherwise try to sell secretly in the Protectorate.

Illicit trade. This is purely internal. The mountain tribes which grow hemp certainly sell it secretly. There is no smuggling by sea or across the Algerian frontier. The product is so low-priced that international contraband organizations are not interested in it, for fraudulent

* See work of R. N. Chopra and Cr. S. Chopra[66 and 67].

** The maximum sales were, in 1941: 3,181,782 packets of 5 g. In 1945, sales amounted to 1,448,069 packets. In 1947 they exceeded 2,500,000 packets, despite the increased price: 25 frs. per 5 g. packet. In 1950 the price of 5 g. was raised to 30 frs.

importation into Morocco would not yield a profit proportionate to the risks incurred.

(*b*) *Illicit supplies:* it may be taken that in all countries where the consumption of hemp is forbidden the supplies are furnished through the illicit traffic. This traffic is fed from:

(i) *Clandestine crops within the country itself:* that is the case, for instance, in Malaya, Burma, Ceylon, Iran, Turkey, Syria, Lebanon, the Egyptian Sudan, Tunisia, Algeria, Morocco, Belgian Congo, Bechuanaland, Kenya, Uganda, Sierra Leone, Swaziland, Zanzibar, Mozambique, Brazil, Mexico, the northern part of South America, Honduras, Jamaica, the United States, Cuba, etc.*

(ii) *The collection of hemp growing wild:* that is the case, for instance, in India, Thailand, Nyasaland, the Rhodesias, Bechuanaland, Basutoland, Swaziland, Kenya, Angola, Mexico, the United States, the Panama Canal Zone, etc. The traffic, whether in wild or in secretly-grown cannabis, is never very extensive. If the hemp grows wild, the consumer generally establishes his own reserve supply and sells the remainder in neighbouring districts.

As for clandestine crops, the necessity for concealment means that they seldom cover a wide area, and therefore cannot provide for a large volume of clandestine trade.

Matters are otherwise in the United States, where it appears that marihuana growing in a number of states has already given rise to a considerable trade. The hemps growing in the United States cannot *all* have a sufficient resin content to be used as inebriants, and marihuana traffickers must obtain their supplies of the raw product in certain districts only, and particularly in Mexico.

(iii) *Contraband coming from other countries.* This form of contraband exists in all countries where hemp does not grow wild, is not cultivated, and is consumed although forbidden, e.g. Canada, Dutch Guiana, Trinidad and Tobago, Egypt, etc.

The negro tribes under French influence in the Chad, Shari and Upper Ubangi regions, who consume large quantities of hemp, are supplied by caravans coming mainly from the southern Sudan. At points where the French authorities can exercise control, these caravans transport only innocent cheap wares, but the forbidden wares (arms, powder, hashish, chopped hemp, etc.) which form the main part of their transactions, are deposited and carefully concealed in various villages in league with the traffickers, to whom the purchaser goes to take delivery of the goods. Suppression of the trade is therefore very difficult.

There is certainly less illicit traffic in untreated hemp than in any other drug, for the product is bulky and low-priced and consequently of little interest to the traffickers.

2. *Raw cannabis resin* (*charas, hashish, chira*)

(*a*) *Legal supplies.* This substance is allowed in only one country, namely India.

Charas is not prepared in India; it comes from Central Asia. It was legally introduced into India by dealers holding a licence from the Government of the Punjab. Importation was strictly controlled. Special depots were established at Leh and Chitral in which charas was stored and from which it was subsequently distributed, but only to resellers in possession of a licence.

Illicit trade. There is a very brisk contraband trade from Sinkiang over the north-west frontier. Further, the prohibition of the consumption of charas in certain parts of India, and the great differences in the duties levied on this product in the various provinces, lead to a considerable amount of inter-provincial smuggling.

(*b*) *Illicit supplies.* Apart from India, raw cannabis resin (charas, hashish, chira) is forbidden in all countries. As it has no medical or industrial value, the sole object of illicit traffic in this substance is to supply drug addicts.

Sources. Until some thirty years ago the main sources of supply were Turkey and Greece. Clandestine supplies to Egypt consisted of Turkish and Greek hashish together with a certain amount of Indian charas. In French North Africa, the Indian product was extremely rare; chira came mainly from Greece, though some consignments arrived from Istanbul.

Greece having forbidden the cultivation of cannabis in 1920, Greek hashish became rarer on the market, although it did not entirely disappear as might have been hoped. Large stocks of resin had probably been concealed, and the Greek Government had to promulgate a new law in 1932, more drastic than that of 1920 and providing for the destruction of stocks. But, during this period, from the end of the First World War to about 1932, the traffickers had attempted to introduce the cultivation of cannabis for the production of resin into other countries of Eastern Europe, e.g. Bulgaria (introduction in 1919 to 1920, prohibition in 1925), Romania (prohibition in 1926), Yugoslavia (introduction about 1927, prohibition in 1932), and Albania.

Turkey had always produced a fairly large quantity of hashish, both for internal consumption and for secret exportation, but when Greek production dried up, Turkey intensified its own production until the Government of the Turkish Republic passed the law of 1933 prohibiting the cultivation, holding and use of, and the trade in, hashish. Thus, during that period, seizures effected both in Egypt and in North Africa (the biggest

* Clandestine cultivation was reported (1946-1948) in the neighbourhood of Paris (Charenton, Vincennes, Maison Alfort, Orly Aerodrome) either in the open air or under glass. The seed was derived from the Near East, North Africa and Mexico.[61]

and best customers of Eastern Mediterranean traffickers), were chiefly of Turkish hashish (from Istanbul and Brusa). In Egypt, Indian hashish (charas) though always rated very high, had a rival in the Turkish product, and both had to compete on the market with a less highly valued form of hashish, namely that from Syria and Lebanon. In North Africa the contraband wares consisted chiefly of hashish from Constantinople (in turbans and soles); whilst there was no Indian, and little Syrian, hashish. During that period some consignments of Greek origin were introduced, but coming from old and often adulterated stocks, they disappointed customers who had been attracted by the former reputation of the Greek drug.

At the present time, the chira (hashish) contraband in French North Africa may be said to be dying out; the amounts seized are now negligible. One reason for this is that the illicit trade in manufactured drugs is more tempting for traffickers than that in cannabis and its resin. Moreover, it was mainly from Tunis that the remainder of North Africa procured supplies. Contraband in chira in Tunisia was in the hands of two or three groups of Greek traffickers, who obtained their supplies from Greece. The prohibition of hemp cultivation and of the preparation of hashish in Greece dealt their trade a blow from which it has not been able to recover, in spite of subsequent attempts to substitute Turkish, Syrian and Albanian hemp.

In Egypt, in spite of the Government's efforts, there is still an active contraband trade, although it is on the wane. The annual reports of the Central Narcotics Intelligence Bureau of Egypt are most instructive, and reference should be made to the abundant material they contain about all matters connected with hashish contraband in the Levant.

Contraband in Egypt is carried out: (i) by sea, and (ii) by land.

(i) *By sea:*

(*a*) Sometimes the traffickers are members of the crews of steamers coming from India and passing through the Suez Canal (the substance in this case is Indian hashish). The attempts to unload the drugs are made at Suez or Port Said.

(*b*) Sometimes the steamers come from various ports in the Eastern Mediterranean (in this case, the hashish is Turkish or Syrian). The port of unloading is generally Alexandria.

(*c*) Sometimes the boats concerned are not steamers, but sailing vessels plying along the coast of Syria and Palestine, and calling at the Egyptian ports. In 1937, 31 kilogrammes 369 grammes of hashish were seized on these small sailing boats, and 23 kilogrammes 577 grammes on steamers. In addition, 141 kilogrammes 760 grammes were fished up from the water or found near the coast. Immersion in shallow parts of the sea of packets of drugs (enclosed in soldered metal containers or rubber bags) is a common practice among the crews of small sailing vessels when they think they are likely to be caught.

(*d*) Sometimes the drug is unloaded under a false declaration in packing cases for harmless goods. In this case, the Customs clearance agents in the ports are frequently in league with the traffickers. Although that branch contains a fair number of honest members, it also includes a good many persons of more doubtful integrity, for anyone can set up as a transit Customs clearance agent. Drastic action to put an end to this state of affairs has been taken in Egypt and in Tunisia. From now on, it will be impossible for persons who are unable to establish their respectability and solvency to deal with transit and Customs clearance.

(ii) *By land:*

The traffic is carried on by car or by railway from Palestine (travellers and sometimes railway employees), or by camel drivers crossing the desert between the Palestine frontier and the Suez Canal. The traffic is chiefly in hashish of Turkish or Syrio-Lebanese origin bought in Palestine.

It is not always possible to determine the origin of contraband drugs. Although Palestine seems at present to be the most important hashish depot in the Levant, it must be remembered that cannabis is not grown there.

The hashish obtained by traffickers comes from various sources:

(*a*) *Asiatic Turkey* (illicit crops).

(*b*) *Syria and Lebanon* (illicit crops): In June 1946 the Lebanese Government promulgated a law prohibiting the cultivation of cannabis.

Nevertheless large quantities of hashish of Syrio-Lebanese origin were seized in Egypt in 1947, 1948 and 1949.

"The Lebanese have this trade and cultivation in their blood", we read in the 1937 report of the Egyptian Narcotics Bureau.

(*c*) *Iraq*. The growing and storing of cannabis are forbidden in Iraq; but investigations have shown that there is a considerable traffic in hashish, probably fed in part by Iranian plantations. No special measures have yet been adopted in Iran to control the cultivation of cannabis for the production of hashish, and there are no regulations governing the export of the drug. That no doubt explains why reports of the Government of the Union of Soviet Socialist Republics have mentioned a considerable amount of contraband in charas (hashish) in the frontier districts between the USSR, Iran and Afghanistan, thereby confirming the statements made by Sinkarenko[36] and Dr. Stringaris[33] as to the spread of

addiction to cannabis preparations in certain parts of the USSR.

To sum up, the contraband trade for the supply of drug addicts originates in India (in a comparatively small measure), Afghanistan, Iran,* and the various countries between those States and the Mediterranean. The Governments of most of those countries are, it is true, making efforts to paralyse clandestine traffic; but often in vain, for they have to deal sometimes with illicit crops covering a small area and skilfully located far from the routes which are watched, and sometimes with small but numerous consignments coming from different districts, often far away, and distributed in stores situated in out-of-the-way places. The stocks thus brought together are transported when necessary to the seaports, where they can be entrusted to sea-going accomplices, or to places near the frontier where smugglers will get them across when a suitable opportunity occurs.

It must not be thought, however, that the groups engaged in illicit hashish traffic are as large as the remarkably well-organized groups of manufactured drug traffickers with their ramifications in all the chief countries of the world.

The few associations of hashish traffickers, generally directed by Greeks, which gravely disturbed the Egyptian abolition authorities for many years, have now been reduced to impotence. Their ringleaders have been imprisoned or expelled. According to the annual reports of the Central Narcotics Intelligence Bureau of Cairo, most of the traffickers arrested since 1937 were independent individuals acting on their own for profit, or small groups belonging to the type of underworld adventurer class to whom regular work is repugnant and who hope to reap a sufficient profit by introducing and reselling hashish in Egypt, to keep them in funds until the next opportunity of attempting a *coup* occurs.

But, although the amount of drugs introduced by any one of these gangs of traffickers is comparatively small, the number of such gangs is large and the aggregate quantity of drugs involved is hence considerable, and a source of permanent concern to the narcotic control services. The same applies to the consignments of hashish unloaded at night on the western shore of the Red Sea, and carried by caravans of nomad Bedouins across the desert to the towns in the Nile Valley. The Egyptian Government is also seriously concerned by the spread of clandestine hemp crops in Upper Egypt. Air patrols are used to spot these crops. The hashish prepared in Upper Egypt sometimes reaches Lower Egypt, passing through the hands of many dealers, themselves often drug addicts.

* See Dr. Dana, *"Le Hachich et ses intoxications en Iran"*, Thesis, Paris, 1938[80].

B. Traffickers who are addicts

It is often very difficult to distinguish between drug addicts and small traffickers. This fact, which has often been noted in the case of dealers in hemp and hashish, is also true of the host of small traffickers in manufactured drugs.

The leaders of the important gangs of traffickers and the directors of the clandestine organizations make money out of the trade but do not take the drugs themselves. On the other hand, numberless small retailers are in many instances recruited — and very easily recruited — from the ranks of drug consumers, for profits on the sale of the drug, possible adulteration, giving short weight, and the like enable them to obtain the wherewithal to satisfy their own vice.

It is such people who are the most dangerous spreaders of addiction. They attempt to market their wares by every possible means. They know that incipient addicts are inexperienced and easily satisfied purchasers, and these they pester with offers and requests, encouraging them to recruit new consumers from among their friends. Their influence on young people is thus nefarious in the extreme.

If they are arrested, they always deny that they are traffickers, confessing on the other hand that they are addicts. Thus they hope to secure leniency from the courts, whereas from the social point of view they are actually the most dangerous offenders. It is criminals of this type who have introduced chemical narcotics among the female population of Tunis, and it is due to them that some young pupils in the Tunisian schools contract the habit of smoking takrouri. It is certainly they who popularized the smoking of marihuana cigarettes among young people in some of the schools in the United States.

C. Suppression

How should these evil-doers be dealt with? It is difficult to draw up a plan which could be applied to all contaminated districts; the conditions vary too greatly.

In the *United States,* for instance, addicts appear to be supplied by home production (wild plants or illicit crops) and by smuggling across the Mexican frontier. Attempts to introduce the drug by sea (Pacific and Atlantic) have so far been of small importance. Few consignments of raw cannabis resin (charas, hashish, chira), have so far been reported.

It may therefore be hoped that the "Marihuana Tax Act" of 1937 will suffice to ensure control over cannabis traffic, and to prevent the abuse of the plant and its derivatives. The general measures adopted for controlling and stopping the traffic in narcotic drugs (opium and manufactured drugs) by sea, air and land also make it possible to seize hashish, chira, and charas if attempts to

introduce these drugs into the United States are made, as is to be expected and feared.

In *Canada,* marihuana smokers are certainly supplied by contraband trade, mostly from the United States. It is quite improbable that cannabis growing in the Canadian climate can produce sufficient quantities of inebriating resin to be used by drug addicts. The authorities therefore merely have to watch for traffic from outside, as in the case of other drugs.

In *French North Africa,* the task is more complicated. The section of the population which indulges in cannabis is exclusively native. It has been consuming the drug for a very long time. It is well aware that hemp cultivated in certain areas of Northern Africa yields a product which is of value to smokers. The authorities must therefore safeguard themselves in the first place against internal illicit traffic. In Morocco, Tunisia, and Algeria clandestine crops are discovered every year, and Dr. J. Bouquet believes there are undoubtedly large crops in Algeria which are represented as crops for the textile fibre.

The authorities must also— and above all — take steps to stop the secret importation of chira (hashish). Compared with the amounts smuggled forty years ago present-day illegal imports are very small indeed. Smuggling still goes on, however; and relations between the Near East and French North Africa are too close for producers of hashish (chira) not to try to sell a consignment from time to time in Tunisia, whence it can easily be sent (via Italy or France) to America.

The same applies *a fortiori* to *Egypt,* which is more vulnerable because nearer to the producing countries. There have, moreover, been many attempts at clandestine hemp-growing in Upper Egypt.

In *India,* the problem is still more complicated, as hemp grows wild, and charas production is carried on, uncontrolled, in neighbouring territories which have no regulations concerning the production of or trade in this drug.

D. Prohibition or Controlled Toleration

Since hemp resin has no medical or industrial value and since resin-producing hemp plants give few seeds and only provide textile fibre of a poor quality, it should be very simple to reach an agreement forbidding hemp growing outright in districts where its resin production is high. That is a task for the United Nations.

Unfortunately, the views of various States are opposed to such a radical measure. In India there is the politico-religious problem, and in Tunisia and Morocco the politico-social problem. Rather than institute prohibition, which might, they fear, be badly received by their subjects, who have used hemp for centuries, the Governments of those countries resort to a policy of controlled toleration, restricting contraband and maintaining consumption within moderate limits. The Egyptian Government (see *Annual Report of the Narcotics Intelligence Bureau,* 1936, p. 172) disputes that this is achieved. It rightly contends that it is delusion to believe that an addiction can be moderated; for populations which crave narcotics the only factor that compels moderation is that of financial inability to buy the drug. Nothing could be truer, and that is why, year by year, the Government of Tunisia raises the selling price of takrouri by several francs a packet.

Dr. J. Bouquet is convinced that if measures of absolute prohibition had been taken twenty-five or thirty years ago excellent results would have been achieved and the problem would no longer be so acute. He thinks, however, that at the present time total suppression (at least in countries where the consumption of hemp is a long-standing habit) would result in an increase of addiction to manufactured drugs, which are much more dangerous and less in keeping with the temperament of the populations in question. What is required, if gradual suppression of the drug is to be achieved, is ceaseless vigilance and a persevering effort to prevent these various populations, receiving any substantial fresh supplies through contraband channels.

In all countries, both those where the use of hemp resin and its preparations is forbidden and those where it is still tolerated, it is essential that there should be a sufficiently strict system of control to cut off clandestine supplies. Further, international and national measures of control should aim both at attaining this end in countries which have long been tainted, and at arresting its development in countries not yet heavily contaminated where the vice is, however, giving cause for alarm.

What measures can be suggested to deal effectively with traffickers?

Dr. J. Bouquet considers that fines have no effect. That is also the opinion of the Director of the Central Narcotics Intelligence Bureau of the Egyptian Government who states in one of his reports that only 1 per cent of the fines imposed is paid into the coffers of the State. The only fines paid are those imposed on the small number of sentenced traffickers who are members of important gangs. Such fines are paid out of the gang pool. The small traffickers, who form the great majority of prosecuted offenders, are either without means, or else, if they happen to own any real property, have taken care to register it in the name of their wives or near relatives.

Therefore, although the system of fines may have some effect in cases where pharmaceutical importers, chemists etc. have diverted drugs from the legal trade into the illicit traffic, it is quite useless in most of the ordinary cases of clandestine traffic. It is not, however,

by any means suggested that the system should not be maintained. It constitutes a salutary threat for certain accomplices of the traffickers, such as hotel-keepers, café-keepers, warehousemen, carriers, forwarding agents and others.

Imprisonment, followed by deportation from the territory where the offence has been committed and refusal of permission to return, seems to be the measure most feared by traffickers who are foreigners in the country where they operate. But such deportation should be strictly applied in all cases, and would be still more effective if the various States directly concerned in combating addiction agreed that every deportation for traffic in drugs would automatically entail refusal of permission to reside in the other countries, or, at any rate, strict supervision capable of paralysing the trafficker's usual activities.

In the case of people who engage in drug traffic in their own country, the only effective measures (if the countries concerned do not accept the principle of corporal punishment which, however, is very effective) are sentences of imprisonment with hard labour, especially if in addition to imprisonment and fine the offender is placed under administrative or police supervision in some place far away from the district where he practised his trade. A draft decree on these lines has been studied in Tunisia. It provides for the immediate expulsion from the territory of the Regency of Tunis of all foreign traffickers after they have served their term of imprisonment.

As for traffickers of Tunisian nationality, when discharged from prison they will be placed under supervision in the desolate territories to the south of Tunisia, where the poverty of the nomadic tribes will preclude any trafficking in drugs. The Decree of 1 July 1939 also provides that parents whose children are minors and indulge in drugs (though this has reference mainly to heroin and cocaine) shall be able to ask the courts to intern the young offenders for a varying period in special establishments.

Traffickers who deserve no pity are those who, being themselves addicts, try to pay for their daily dose of drugs by selling part of their supplies at a profit. They are the most dangerous propagators of drug addiction. At the present time, this type of person is most frequently encountered in the trade in manufactured drugs, but there are also plenty of them in the illicit traffic in hashish (charas, chira).

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The Question of the International Opium Monopoly

The starting point of this question and the first decisions on the international opium monopoly are to be found in the Official Section of the *Bulletin on Narcotics*, vol. II, no. 3 (July 1950), where mention is also made of a meeting of the principal drug-manufacturing countries on 7 August 1950 and of a Joint Committee of those countries together with the principal opium-producing countries on 14 August 1950, both in Geneva.

These meetings having taken place, the *Bulletin* now publishes herewith extracts from their reports to the Commission on Narcotics (documents E/CN.7/200 and E/CN.7/201).

A. Report of the meeting of representatives of the Principal Drug-manufacturing Countries

The meeting was held at the Palais des Nations, Geneva, from 7 to 15 August 1950.

The Meeting's Work

The meeting, which was of an exploratory character and was without prejudice to the further consideration by Governments of the outcome of the meetings of the Joint Committee, decided to devote its session to an examination of the draft of the proposed interim agreement to limit the production of opium to medical and scientific needs (E/CN.7/199 and conference room paper DM/3).

It first held a general debate on the draft text, during which the representatives and observers present outlined the views of the Governments which they respectively represented on the draft instrument as a whole and on the principles on which it was based. Following on this general debate, the meeting devoted the rest of its session to a detailed examination of those sections of the draft agreement which were of primary importance to countries manufacturing drugs from opium.

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The International Opium Monopoly

After a detailed examination of the problems involved in limiting the production of opium to medical and scientific needs and in controlling the international trade in that narcotic raw material, the meeting came to the conclusion that the control measures for limiting the production and regulating the distribution of manufactured drugs, which are provided by existing international treaties and which have now worked for a long period with a considerable measure of success, could not be applied with equal success to the production of and trade in opium.

The meeting accordingly decided, with a view to achieving an effective control of opium, to envisage the establishment, within the framework of the United Nations, of an international opium monopoly, and it accepted in principle the measures to that end provided for in chapter III of the draft. The meeting was fully aware that the creation of this monopoly as an international non-profit-making corporation with commercial functions would be an entirely new departure in international co-operation; it was equally aware that the operation of such an organ would have economic consequences both for countries producing opium and for those in which drugs were manufactured from that substance. They would certainly entail mutual concessions on the part of both groups of countries, but the meeting recognized the overriding interest of eliminating the present over-production of opium, from the consequences of which the world now suffered.

Inspection (section 48, sub-paragraph (i))*

Having accepted the principle that the international opium trade should be organized as a monopoly, the meeting considered in some detail all the provisions of the draft agreement designed to ensure that such a monopoly should work efficiently and effectively. It would be of primary importance to ensure that there

* Section 48, sub-paragraph (i) reads: ". . . inspect areas sown with the opium poppy in the territories of all parties which permit the production of opium as well as storehouses of monopolies and their relevant records . . ."

was no production of, trade in or use for manufacturing purposes of opium except as provided for in the agreement. To ensure this it would be essential for the executive organ of the international monopoly to have the right to inspect the opium trade at every stage from the time at which the poppy seeds were planted until the manufacture of the alkaloids from opium had been completed. With that in view the representatives and observers of all the States represented at the meeting declared that the Governments concerned would be willing to accept international inspection and to give all due facilities to inspectors of the opium agency to make such inspections as would be necessary to ensure that the provisions of the agreement were being carried out in their countries.

The meeting introduced the necessary amendment into the text of the draft agreement to provide for such inspection, and expressed its confidence that the opium-producing countries would, in the spirit of co-operation which they had so clearly demonstrated at Ankara, undertake to grant similar facilities to the agency's inspectors in order to ensure the successful operation of the international opium monopoly.

The Export of Manufactured Drugs from Opium-Producing Countries

The Committee gave some thought to the state of affairs which would arise under the international monopoly whereby opium-producing countries which manufacture drugs from opium would be able to obtain their raw material more cheaply than the manufacturing countries, since such opium would be obtained within the country concerned and not through the international monopoly. They would accordingly have some considerable advantage over the manufacturing countries in competing for the export trade in manufactured drugs. The meeting unanimously agreed that the way to meet this situation would be for the opium-producing countries to undertake not to export drugs which they had manufactured from opium.

The Chairman of the Regulating Committee

In connexion with its consideration of section 29, paragraph 4 (paragraph reference number 161)* the meeting discussed a number of proposals as to the international organization or other body which it would be desirable to make responsible for appointing the chairman and vice-chairman of the regulating committee, and decided to bring the proposals to the notice of the Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries for its consideration when discussing this matter. The following proposals were made:

(*a*) The regulating committee, from a panel of candidates to be nominated by the Economic and Social Council;

(*b*) The Economic and Social Council;

(*c*) The Secretary-General, on a unanimous proposal by the regulating committee or, if that were unobtainable, on a proposal by a three-fourths majority of that committee.

Purchase Price of Opium from the International Monopoly

The meeting considered the situation which would arise as a result of the abolition of the free market in opium and the fixing of prices by the international monopoly. Manufacturers might then be unable to sell drugs made from opium in competition with drugs coming from countries of which the Governments were not parties to the proposed agreement. It was feared that competition would be particularly strong in the export market, especially from countries manufacturing alkaloids from poppy straw.

Various proposals were made to meet the difficulty, one of which foresaw the creation of a compensating fund from which the international monopoly would be able to subsidize the Governments of countries in which manufacturers were unable to meet the competition in question.

The meeting decided to bring this difficulty and the proposed solution to the attention of the Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries, pointing out that it would be in the ultimate interests of the opium-producing countries to provide the means for a solution of the problem and thus make sure of a continued market for their opium. If the problem were left unsolved, and the competition in the drug trade proved in the event as severe as the meeting feared, the result could only be an eventual, if not an immediate, reduction in the orders for opium which the manufacturers would place with the international monopoly.

Reference was made in the course of the discussion to the insuperable difficulties which some countries would find in present circumstances in complying with any requirement that payments must be in dollars or in convertible currency.

* This paragraph reads: "The chairman and vice-chairman shall be appointed by . . . (here insert the name of an appropriate international organization) or if it shall be unable so to do by the Secretary-General, to hold office for a period of . . . years."

B. Report of the Joint Committee of the Principal Drug-producing Countries and of the Principal Drug-manufacturing Countries on its first session

The meeting was held at the Palais des Nations, Geneva, from 14 to 28 August 1950.

Introduction

The first objective in the plan elaborated by the Commission on Narcotic Drugs and approved by the Economic and Social Council, in which a stage-by-stage solution of the problem of limiting the production of opium to medical and scientific needs was contemplated, was attained by the success of the meeting of the opium-producing countries at Ankara at the end of 1949. The second stage of its development was reached with the convening at Geneva of the Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries in August 1950, which was immediately preceded by the meeting of representatives of the principal drug-manufacturing countries.

The Joint Committee was alive to the fact that despite the undoubted benefits which the existing international conventions on narcotics and particularly the strict control of drugs manufactured in authorized factories had brought to the world, the successes so gained had only been partial and drug addiction remained a widespread evil. It also noted that although authoritative opinion had long been convinced that this evil could not be effectually suppressed until the production of the raw materials used to make narcotic drugs had been brought under effective limitation, and though a quarter of a century had elapsed since the adoption of a convention designed to achieve this limitation, the quantity of opium produced annually was still vastly in excess of the world's needs for medical and scientific purposes.

It was in the knowledge of these facts that the Joint Committee paid tribute to the high achievements at Ankara, where the countries represented had agreed that the production of opium each year should be limited to the world requirements for medical and scientific purposes, strictly calculated and communicated by Governments to a central co-ordinating authority, and by outlining an organization and procedure for this purpose had taken a great step towards the placing of this dangerous substance under an effective international control.

The Committee adopted the Ankara proposal that the international opium trade should be governed and operated by an international opium monopoly working in co-operation with the national opium monopolies in the various producing countries; and it foresaw the ultimate inclusion of that international monopoly in the general structure of the international control of narcotic drugs which would be provided by the proposed single convention. It further adopted as the basis of its discussions the propositions that opium production could and should be limited to medical and scientific requirements and that such limitation could best be achieved by means of an international monopoly. That organ would take over the stocks of opium in the producing countries and govern all legitimate trade in the commodity, thus making it possible to isolate and expose the channels of illicit trade. These operations, combined with the international inspection of the processes of opium production, which the Committee agreed would be an essential and inevitable feature of the monopoly system, should in great measure eliminate the considerable over-production of opium at present diverted into illicit channels to feed the clandestine factories which supply narcotic drugs to addicts.

The theoretical concept of an international monopoly demands for its practical realization a carefully prepared plan, based as far as possible on the existing pattern of the opium trade and designed to provide for all foreseeable contingencies. The plan embodied in the proposed interim agreement laid before the Joint Committee, which was based on the conclusions of the Ankara meeting, had been elaborated after much research and the Joint Committee subjected it to a searching scrutiny. A complete examination of all its implications, however, required more time than the Committee had at its disposal, and the members moreover felt bound to consult the Governments they respectively represented in regard to a number of the more important provisions of the draft instrument. In particular, the determination of a stable basic price for a substance having a variable chemical composition and hence a variable commercial importance is inevitably an intricate task, further complicated by the wide fluctuations in price which, by reason of war and other causes, have occurred in recent years.

The Joint Committee recognized the necessity of finding a generally acceptable formula for determining the basic price at which the international monopoly could conduct the opium trade, if the final stages towards the conclusion of the interim agreement were to be accomplished with the least possible delay. With this in view it decided that its members should reassemble immediately before the next session of the Commission on Narcotic Drugs, which will open on 30 November 1950.

Terms of Reference of the Joint Committee

In its report to the Economic and Social Council on its fourth session the Commission on Narcotic Drugs envisaged that if the results achieved by the *Ad Hoc* Committee of the Principal Opium-producing Countries should justify such a course, and a proposal to that effect be included in its report, the representatives of the principal drug-manufacturing countries should meet

those of the principal opium-producing countries before the fifth session of the Commission on Narcotic Drugs (see document E/1361, section 11 (*b*)).

The *Ad Hoc* Committee of the Principal Opium-producing Countries, having succeeded in obtaining the agreement of the producing countries which took part in its work to the share of the annual world production of opium which each should have under the proposed interim agreement, included in the resolution which it adopted on 6 December 1949 a request to the Secretary-General to arrange for the joint meeting which the Commission on Narcotic Drugs had foreseen to take place before the opening of the fifth session of that organ, and proposing that the Joint Committee should consider, if it so desired, a draft interim agreement based on the outlines which the *Ad Hoc* Committee had elaborated.

The Interim Committee on Programme of Meetings accordingly laid before the Economic and Social Council at its eleventh session in July 1950 a proposal based on the request of the *Ad Hoc* Committee. This proposal the Council approved on 4 July 1950, convening the Joint Committee for 14 August 1950.

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General Observations on the Work Done

As was the case with the meeting of representatives of the principal drug-manufacturing countries, the work of the Joint Committee was of an exploratory character and the decisions it took were accordingly of a nature to facilitate the further development of the proposed interim agreement to limit the production of opium to medical and scientific needs.

The Joint Committee devoted the greater part of its session to consideration of the revised draft of that instrument which had been communicated to it by the meeting of representatives of the principal drug-manufacturing countries. The Joint Committee considered some sections of this instrument in detail and made a number of important amendments to the text. In the case of other sections the Joint Committee contented itself with discussing the principles involved, and clarifying the differences of opinion which existed between various Governments and between the two groups of Governments which represented the principal opium-producing countries and the principal drug-manufacturing countries respectively. It also outlined methods of attacking the remaining unsolved problems for which solutions would have to be found before the proposed interim agreement could be elaborated in final form.

The amendments to the text of the interim agreement which were elaborated as a result of the Joint Committee's detailed examination of some sections of that instrument had been collected together in conference room paper JC/14, and the Committee decided *to request the Secretary-General to incorporate these amendments in a second revision of the proposed interim agreement* (Resolution B).

The Joint Committee has devoted the remaining sections of its report largely to matters on which it debated principles and on which it took decisions of a general rather than a specific character. In these sections the "paragraph reference numbers" referred to are taken from the text of the interim agreement.

Limitation of the Production of Opium

The Joint Committee reaffirmed the principle adopted by the *Ad Hoc* Committee of the Principal Opium-producing Countries that the aim should be to limit the production of opium to that required each year for the medical and scientific needs of the world. It further agreed with the *Ad Hoc* Committee that those world requirements should be based each year on the opium requirements of the countries manufacturing drugs from that substance for use in accordance with the provisions of the Convention of 1931 for Limiting the Manufacture and Regulating the Distribution of Narcotic Drugs as amended by the Protocol of 1948.

The International Opium Monopoly

(*a*) *Establishment and structure*

The representatives of the producing countries were in agreement with the view expressed in the report of the meeting of representatives of the principal drug-manufacturing countries that the reorganization of the opium trade as an international monopoly should be envisaged for an effective limitation of the production of opium exclusively to medical and scientific needs, and that such an international monopoly would have to be based on national opium monopolies in all producing countries. The Joint Committee shared the view on the establishment of an international monopoly of the trade in opium expressed in chapter III of the revised draft of the proposed interim agreement to limit the production of opium to medical and scientific needs. It was also of the opinion that all producing countries which had not already done so should organize or reorganize their national opium monopolies on the lines indicated in section 4 of the revised draft of the interim agreement.

The Committee was of the opinion that the reorganization of the international opium trade on a monopoly basis should be done in such a way as to preserve as far as possible the present customs and practices of the legitimate opium trade; and without committing itself as to the details of the requisition, allocation and storage procedures provided for in sections 6 to 17 of the revised draft, the Committee held that they contributed towards a solution to the practical problems involved in limiting the production of opium and in organizing the trade on an international monopoly basis.

The Committee shared the view also expressed in section 8 of the report referred to above that the international organ required to achieve these ends should be an international non-profit-making corporation within the framework of the United Nations, and that such an organ could well be established in accordance with the provisions of part B of chapter III of the revised draft of the interim agreement.

The Committee discussed in great detail the composition and working of the proposed opium regulating committee and the voting system it should use in coming to its decisions. These matters are referred to in section 11 of this report.

(*b*) *Operating costs*

Various proposals were examined for allocating the operating cost of the international monopoly, in the discussion of which it was stressed that the cost of that organ should be kept to a minimum compatible with its proper functioning. One proposal provided for the cost to be borne almost entirely by the opium producers through the levy of a commission on the international monopoly's purchases of opium or by the drug manufacturers through a similar levy on its sales or by both opium producers and drug manufacturers jointly. Allied with this proposal was a plan for at least part of the cost to be met from annual contributions to be made by all parties to the agreement. Another view was that the cost should be partially or wholly borne by the United Nations, particularly in view of the fact that all mankind would benefit from the limitation of opium production which the interim agreement would achieve. In this latter connexion the Joint Committee considered especially that the United Nations should pay at least a share of the inspection costs.

To assist the Joint Committee in its consideration of the problem of operating costs, the representative of the Secretary-General gave a very tentative estimate of what those costs might be for an average year, based on the assumption that the annual sale of opium would give the international monopoly a turnover of some $6 million. On that basis it was estimated that a commission of about 10 per cent on the proceeds of the international monopoly's opium sales would be sufficient to cover its expenses.

The international monopoly's expenses would be occasioned by its administrative activities and by the service of the loan it would have to obtain to buy a stock of opium at least equivalent to one year's requirements for medical and scientific needs. The Secretariat was studying plans for reducing the service charge on this loan, which if they could be successfully developed would reduce the operating costs of the international monopoly. Stress was laid on the difficulties of forecasting the administrative expenses with any degree of accuracy. Some factors were still unknown and, for example, the reduction of the estimate for storage and insurance costs might depend on the obtaining of favourable rates by special negotiation. The figure given must therefore be considered as a first and tentative estimate, subject to qualifications of the type mentioned above.

Views were also expressed that the establishment of the international monopoly would in practice bring about savings for both producers and consumers of opium in their respective spheres of operation.

The Opium Regulating Committee

(*a*) *Voting*

The Joint Committee, after exhaustive discussion, evolved a system of voting for the regulating committee different from that proposed in the original draft of the interim agreement (E/CN.7/199) and from the modification to that system proposed by the meeting of representatives of the principal drug-manufacturing countries.

The new system was based on the principle that the total number of votes to be allocated to the group of opium-producing countries and to the group of drug-manufacturing countries would be equal, and that within each group a part of the votes would be equally divided among all members of that group and a part divided amongst them in accordance with their respective shares of the world's opium production or of the total world imports of opium as the case might be. Fears were expressed, however, in a subsequent debate that the voting system proposed, particularly in view of the differing majority requirements in different cases, might in practice prove somewhat cumbrous and might lead to a lengthening of the sessions of the opium regulating committee. This in turn would increase the administrative expenses of the international monopoly.

The Joint Committee also considered that the regulating committee, which would be composed of representatives of all parties to the agreement, might prove too large and unwieldy a body to discharge its functions quickly and efficiently. The Joint Committee accordingly foresaw the possibility that the regulating committee would under paragraph 2 (*r*) of section 35 (paragraph reference number 203) of the draft agreement, providing for the delegation of its powers, set up a small executive committee to take over many of its routine functions.

(*b*) *Election of the Chairman and Vice-Chairman*

The Joint Committee considered the proposals put forward by the meeting of representatives of the principal drug-manufacturing countries in section 11 of its report for a procedure for electing the chairman and vice-chairman of the regulating committee. The Joint Committee was aware of the necessity for a procedure which would ensure the election of persons of the

highest competence, integrity and impartiality, and with that end in view provided for the election of those two officers under the following conditions. The regulating committee would hold a secret ballot on a panel of three or four candidates whom the Economic and Social Council would have previously nominated, the officers to be elected by a three-fourths majority of all votes cast. Should the regulating committee be unable to elect either of the officers by this method, the Secretary-General should make temporary appointments for a duration of eighteen months.

Inspection

The Joint Committee considered at length the proposals for the international inspection of the opium trade provided for in the revised draft of the agreement (paragraph reference number 264/Rev.2) and the views of the meeting of representatives of the principal drug-manufacturing countries on this subject which are contained in section 9 of its report.

All representatives and observers attached importance to the question of inspection, though apprehensions were voiced at first by representatives of producing countries as to the necessity for it; and doubt was expressed as to the proper authority to direct inspections, the occasions on which they should be carried out, their scope and how they should be paid for. In particular the representatives of all the producing countries expressed grave doubt about their being able to persuade the Governments they respectively represented to accept the text in sub-paragraph (i) of section 48 (paragraph reference number 264/Rev.2) without extensive modification, as the principle of inspection involved an inroad into national sovereignty. The Joint Committee accordingly decided to set up a sub-committee composed of the representatives of India and Iran, as representing the opium-producing interests, and of the Netherlands and the United States of America, as representing the consuming interests, to formulate a suitable alternative text to be incorporated in the draft agreement which might find a reasonable chance of acceptance, especially by the producing countries.

Consequent upon the discussions which took place in the Sub-Committee the Joint Committee came to the unanimous conclusion that, in order to ensure the proper functioning and successful operation of the international monopoly, some form of inspection would be necessary. It considered that since the limitation of opium production would benefit the community of nations, all Governments should make a contribution towards the measures necessary to ensure that the machinery to be set up to control opium production should work efficiently. While it would not be equitable if the producers of opium and the manufacturers of drugs from that substance should bear the whole cost of inspection, the Joint Committee realized that those countries which derived some profit from the trade in a dangerous substance had a special responsibility to prevent the suffering which results from the uncontrolled trade.

The Joint Committee finally adopted the following resolution (resolution C) on 24 August:

"*The Joint Committee* of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries,

"*Being convinced* of the supreme necessity for inspections as an integral part of the scheme of international control over the production and utilization of opium envisaged in this Agreement,

"*Decides* that the representatives present shall submit a proposal to the Governments of the Members of the Joint Committee for a provision on the following lines to replace sub-paragraph (i) of section 48 in the revised draft of the proposed interim agreement to limit the production of opium to medical and scientific needs (paragraph reference number 264/Rev.2):

"The Agency shall, as directed by the Secretary-General, carry out inspections in the territories of all parties in order to ascertain how and to what extent the provisions of the present Agreement are being carried out. The inspections may be either technical or investigatory.

"The technical inspections may be directed at intervals to ensure that the operations of monopolies are being carried out in conformity with the obligations assumed by parties;

"Inspections may also be carried out:

"(i) To ensure that opium imported by consumers is utilized only in the manner set out in this Agreement and that no other opium is either imported or traded in; and

"(ii) To ensure that in all the territories of all parties effective measures are being taken to suppress illicit cultivation and traffic.

"Investigatory inspections may only be undertaken if the Secretary-General is satisfied that there is *prima facie* evidence that such illicit cultivation or illicit traffic exists.

"Officers of the competent national authorities shall be associated with the inspecting officers in the discharge of their functions.

"The reports of the inspecting officers will be submitted to the Secretary-General, who will transmit them in due course to the Regulating Committee."

Allocation of Shares in the World Opium Production

In connexion with the discussion of paragraph 7 (*b*) of section 12 of the draft agreement (paragraph refer-

ence number 112), some delegations brought to the notice of the Committee a problem which might arise when the international monopoly started operations. On the assumption that the world requirements of opium in a given year amounted to 450 tons, the amount of Indian opium in that total would not exceed some 30 tons. However, the demands for Indian opium which consumers would make to the international monopoly would greatly exceed that figure if the trend at present noticed in the opium trade continued along the same lines. In recent years, for instance, the United Kingdom alone had bought about 100 tons of Indian opium annually.

In this connexion the Joint Committee gave some thought to the agreement reached at Ankara concerning the obligations of the international monopoly to supply consumers, in so far as practicable, with opium of their choice, and to the fact that it would be extremely difficult for the international monopoly to fulfil this obligation if the gap between supply and demand were as great as in the example quoted.

A suggestion was put forward that the difficulty could be surmounted if a revision of production shares were envisaged after the first year of the international monopoly's operation so as to bring supply and demand, in so far as qualities and origins of opium were concerned, as far as possible into line with the conditions that would obtain at that time, while not favouring the production of any one country too greatly at the expense of another. The interim solution of the problem during the first year of the international monopoly's operation might be achieved by providing for the international monopoly to take over during that year an amount of Indian opium for its stocks sufficient to satisfy, as far as possible, the demands for Indian opium during that year.

The Fixing of the Price of Opium

After a general debate on the question of the prices to be paid for opium once the trade in that substance had been organized as an international monopoly, the Joint Committee was of the unanimous opinion that a basic price for opium should be fixed for the life of the Agreement. That basic price should be adjusted in respect of opiums of different origins and having different compositions and characteristics.

Two distinct opinions crystallized out of the general debate. The producing countries considered that the price of opium during the years 1947, 1948 and 1949 should be taken into account in establishing the basic price at which the international monopoly would buy and sell opium. The manufacturing countries, on the other hand, were of the opinion that the basic price should be fixed in relation to pre-war opium prices. In an attempt to reconcile these divergent views a sub-committee was set up, composed of the representatives of Turkey and Yugoslavia on the producers' side and France and the United Kingdom on the consumers' side. It debated the basic price question very thoroughly but did not reach agreement on a method for establishing it. The producing countries held to the view that the average prices paid for opium during the years 1947-1949 should be used for the establishment of the basic price, while the representatives of the manufacturing countries considered that the current indices of world wholesale prices, which were based on prices in the year 1937, should be applied to the price of opium in that year for the purpose of establishing the basic price. As an alternative, they proposed that the average price in the years 1938, 1939, 1948 and 1949 could be used to establish that price.

In spite of its lack of unanimity on how the basic price of opium was to be established, the Committee agreed that once established it should be subject to change if a change of more than 10 per cent was recorded in the index of world wholesale prices as published by the London *Economist* and the Bureau of Labor Statistics in Washington. In addition the Sub-Committee proposed adjustments to the basic price in respect of some or all of the following factors:

Variation in respect of morphine content above or below (say) 12 per cent;

Variation in respect of the "national factor";

Variation in codeine content above or below (say) 1.01 to 1.5 per cent (this adjustment might take the place of the adjustment proposed for the "national factor", which it was considered would be difficult of precise assessment);

A premium for morphine content higher than 15 per cent;

Changes in the price of opium alkaloids on the export market;

A subsidy to be paid to producers from a compensation fund in the case of loss of production resulting from bad crops; and

A subsidy to be paid to manufacturers from a compensation fund to assist them in meeting the competition on the export market of alkaloids manufactured from poppy straw.

Currency to be Used in Opium Transactions

The Joint Committee considered the view which the meeting of the representatives of the principal drug-manufacturing countries had expressed at the end of its report that some consumers would find insuperable difficulties in paying the international monopoly in dollars or in convertible currency for the opium which they purchased from it. On the other side of the picture the Joint Committee fully understood the desire of the pro-

ducing countries to sell as great a proportion as possible of their opium for convertible currency, of which they stood in great need.

After the Committee had discussed the matter at some length, it was suggested that the best plan would be to provide that when the international opium trade was reorganized as a monopoly the same currencies as were ordinarily used before the change took place should continue to be used for opium transactions. It became clear that a certain proportion of the moneys paid to and by the international monopoly would necessarily have to be in convertible currency, but in view of the present extremely fluid situation as regards the convertibility of one currency into another it was considered that the necessary provisions in the interim agreement should be so drafted as to provide for the greatest possible flexibility.

Export of Opium Alkaloids from Opium-producing Countries

In section 10 of its report the meeting of the representatives of the principal drug-manufacturing countries had referred to the competition between drug-manufacturing and opium-producing countries which might arise under the interim agreement if the producing countries were to manufacture opium alkaloids for export. They would then have an advantage over the manufacturing countries in that they would be able to obtain their raw material more cheaply.

The manufacturing countries represented on the Joint Committee accordingly introduced an amendment (paragraph reference number 43/Rev.1) to the revised draft of the interim agreement under which producers would undertake not to export opium alkaloids. The Joint Committee did not take a decision on the principle underlying that amendment but the representatives of the producing countries expressed the view that the competition to be expected from their countries in the reasonably near future in the manufactured drug trade was so negligible as to make such a clause unnecessary. The representative of India considered that such restrictive provisions should not be included in the draft agreement unless they were absolutely vital to its successful implementation. Having no knowledge of the views of the Governments of Turkey and Yugoslavia on the matter the representatives of these two States accordingly reserved their respective positions. The representative of India stated that the Government of India was not willing to accept the restriction and claimed freedom to continue the export of drugs which India had undertaken during the war as a contribution to the allied war effort.

Purchase of Opium Alkaloids

The Joint Committee came to the unanimous conclusion that it would be desirable to insert into the interim agreement a provision whereby parties to that instrument would undertake not to import opium alkaloids from States which were not parties to the agreement.

Consultation with the European Payments Union

In order to obviate any possible conflict between the provisions of the proposed interim agreement and the regulations governing the members of the European Payments Union in regard to the use of European currencies paid by the international monopoly to producers for opium, the Joint Committee decided *to request the Secretary-General to consult the competent authorities of the European Payments Union with a view to ensuring that the provisions of the proposed interim agreement, in so far as they would affect members of the European Payments Union, should accord with the trade and payment regulations prescribed or to be prescribed by that Union, and in particular that members of the Union which received European currencies as payments from the international monopoly should be permitted to use such currencies within the framework of the Union.* (resolution D.)

Recasting of the Draft Interim Agreement

On the proposal of the observer of Belgium, supported by the representative of France, the Joint Committee gave some consideration to the structure of the draft interim agreement from the point of view of its examination in due course by the various national legislative bodies which would have to consent to it before the agreement could enter into force. There were two aspects of this matter: one was the possible desirability of making it easier for national parliaments to examine the instrument by recasting it in such a way that the body of the agreement would contain only general principles and the provisions which would require parliamentary action, such as provisions establishing financial obligations, detailed technical provisions being relegated to annexes. The second was the question of providing a somewhat stricter amendment procedure for those clauses of the agreement which dealt with matters of principle, while retaining for the technical provisions a procedure based on that included in the present draft.

The Joint Committee accordingly decided *to request the Secretary-General to examine the possibility of recasting the text of the proposed interim agreement on the lines which the observer of Belgium proposed.* (resolution E.)

Re-examination of the Functions to be Performed by the Regulating Committee

On the proposal of the representative of India that the draft agreement should be re-examined with a view

to simplifying its provisions, particularly those relating to the functions of the regulating committee, to the procedure for the distribution of voting rights and for the exercise of voting, to the functions of the regulating committee that could be delegated to a smaller committee, and to the finances of the Agency, the Joint Committee thought that attention should be paid during later discussions to evolving a simpler voting procedure and to studying more closely the arrangements for the delegation of functions of the regulating committee to a smaller committee.

Further Development of the Interim Agreement to Limit the Production of Opium

At the end of its session the Joint Committee realized that a number of important principles still remained to be settled before it would be possible to elaborate the interim agreement in a form suitable for submission to the Economic and Social Council, and it accordingly considered what steps should be taken to facilitate such elaboration.

It was of the opinion that a further meeting of the representatives present at its first session should take place before the opening of the fifth session of the Commission on Narcotic Drugs on 30 November 1950. This further meeting should discuss, and if possible agree, on any of the matters on which the Joint Committee had been unable to reach a unanimous decision, and in particular on the question of the fixing of the basic price of opium. The Joint Committee accordingly decided *to request the Secretary-General to explore the possibilities of its members reconvening about 15 November 1950 at the headquarters of the United Nations or alternatively about 8 November1950 at Paris to discuss the decisions of principle which they would propose to communicate to the Commission on Narcotic Drugs during its fifth session, and on which they would reach agreement before the session opened.*

After the fifth session of the Commission the Secretariat should redraft and perhaps recast the interim agreement in the light of the decisions taken by the Joint Committee and the Commission, and should, if possible, transmit the revised text to the members of the Joint Committee early in March 1951. During this period the Secretariat might also continue and extend its negotiations to secure the necessary finances for the international monopoly.

In April 1951, if the Commission on Narcotic Drugs and the Economic and Social Council so agreed, the Joint Committee could hold a second session, which might last for four weeks or even more, to consider the new draft of the agreement in detail, and after agreement on the text, transmit it direct to the Economic and Social Council during its thirteenth session in July 1951 for its approval. Should the Council see its way to approve the instrument at that time, it could be opened for signature in August 1951.

The Joint Committee was aware that should the plan for the further development of the interim agreement be found acceptable by the Commission on Narcotic Drugs and the Economic and Social Council, there would be a period during the latter half of 1951 after the interim agreement had been signed and before it came into force. During this period it would be very desirable to set up the international monopoly on a provisional and restricted basis, so as to facilitate its taking over all its functions under the Agreement immediately that instrument came into force.

With a view to putting into force the proposals contained in the foregoing paragraphs of this section, the Joint Committee adopted on 28 August the following resolutions:

"The Joint Committee of the Principal Opium-Producing Countries and of the Principal Drug-Manufacturing Countries

"Decides

"1. To transmit to the Commission on Narcotic Drugs the revised draft of the proposed interim agreement to limit the production of opium to medical and scientific needs, in which the Secretariat has incorporated amendments proposed as a result of the Joint Committee's deliberations;

"2. To submit for the Commission's approval the plans for the further development of the proposed interim agreement which are outlined in section 21 of its report on its first session, and to request the Commission to lay such plans before the Economic and Social Council for approval during its twelfth session; and

"3. To draw the Commission's attention to the requests in its subsequent resolution (resolution H) which, in the circumstances, it has deemed prudent to make to the Secretary-General." (resolution G.)

"The Joint Committee of the Principal Opium-Producing Countries and of the Principal Drug-Manufacturing Countries

"Mindful of paragraph 2 of its resolution (resolution G) submitting for the Commission's approval the plans for the further development of the proposed interim agreement outlined in section 21 of its report on its first session, and requesting the Commission to lay such plans before the Economic and Social Council for approval during its twelfth session;

"Considering that funds will be needed to finance the plans it has outlined;

"Desirous of preventing any delay in the provision of such funds;

"*Decides*

"*To request* the Secretary-General to approach the General Assembly during its fifth regular session with a request for the following funds, the provision of which shall be conditional upon the Commission on Narcotic Drugs and the Economic and Social Council approving the plans the Joint Committee has outlined;

"1. Adequate funds to enable the Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries to hold a second session in the spring of 1951 to consider in detail a new draft of the proposed interim agreement to limit the production of opium to medical and scientific needs, and to provide for such additional services of the Secretariat as may be required for the preparation and holding of such session and which shall not have been provided for in the budget of the United Nations for 1951; and

"2. After the interim agreement shall have been approved by the Economic and Social Council, adequate funds for financing preparatory work for the establishment of the International Opium Monopoly". (resolution G.)

Annex

RESOLUTIONS ADOPTED BY THE JOINT COMMITTEE OF THE PRINCIPAL OPIUM-PRODUCING COUNTRIES AND OF THE PRINCIPAL DRUG-MANUFACTURING COUNTRIES

The Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries

A. *Decides to request* the Secretary-General to publish its report to the Commission on Narcotic Drugs on its first session and the summary records of its meetings in good time before the opening of the fifth session of the Commission.

B. *Decides to request* the Secretary-General to incorporate these amendments in a second revision of the proposed interim agreement.

C. *Being* convinced of the supreme necessity for inspections as an integral part of the scheme of international control over the production and utilization of opium envisaged in this agreement,

Decides that the representatives present shall submit a proposal to the Governments of the members of the Joint Committee for a provision on the following lines to replace sub-paragraph (i) of section 48 in the revised draft of the proposed interim agreement to limit the production of opium to medical and scientific needs (paragraph reference number 264/Rev.2):

The Agency shall, as directed by the Secretary-General, carry out inspections in the territories of all parties in order to ascertain how and to what extent the provisions of the present Agreement are being carried out. The inspections may be either technical or investigatory.

The technical inspections may be directed at intervals to ensure that the operations of monopolies are being carried out in conformity with the obligations assumed by parties;

Inspections may also be carried out:

(i) To ensure that opium imported by consumers is utilized only in the manner set out in this Agreement and that no other opium is either imported or traded in; and

(ii) To ensure that in all the territories of all parties effective measures are being taken to suppress illicit cultivation and traffic.

Investigatory inspections may only be undertaken if the Secretary-General is satisfied that there is *prima facie* evidence that such illicit cultivation or illicit traffic exists.

Officers of the competent national authorities shall be associated with the inspecting officers in the discharge of their functions.

The reports of the inspecting officers will be submitted to the Secretary-General, who will transmit them in due course to the regulating committee.

D. *Decides to request* the Secretary-General to consult the competent authorities of the European Payments Union with a view to ensuring that the provisions of the proposed interim agreement, in so far as they will affect members of the European Payments Union, accord with the trade and payment regulations prescribed or to be prescribed by that Union, and in particular that members of the Union which shall receive European currencies as payments from the international monopoly shall be permitted to use such currencies within the framework of the Union.

E. *Decides to request* the Secretary-General to examine the possibility of recasting the text of the proposed interim agreement on the lines which the observer of Belgium proposed.

F. *Decides to request* the Secretary-General to explore the possibilities of its members reconvening about 15 November 1950 at the headquarters of the United Nations or alternatively about 8 November 1950 at Paris to discuss the decisions of principle which they would propose to communicate to the Commission on Narcotic Drugs during its fifth session.

G. *Decides*

1. To transmit to the Commission on Narcotic Drugs the revised draft of the proposed interim agreement to limit the production of opium to medical and scientific needs, in which the Secretariat has incorporated amendments proposed as a result of the Joint Committee's deliberations;

2. To submit for the Commission's approval the plans for the further development of the proposed interim agreement which are outlined in section 21 of its report on its first session, and to request the Commission to lay such plans before the Economic and Social Council for approval during its twelfth session; and

3. To draw the Commission's attention to the requests in its subsequent resolution (resolution H) which, in the circumstances, it has deemed prudent to make to the Secretary-General.

H. *Mindful* of paragraph 2 of its resolution (resolution G) submitting for the Commission's approval the plans for the further development of the proposed interim agreement outlined in section 21 of its report on its first session, and requesting the Commission to lay such plans before the Economic and Social Council for approval during its twelfth session;

Considering that funds will be needed to finance the plans it has outlined;

Desirous of preventing any delay in the provision of such funds;

Decides

To request the Secretary-General to approach the General Assembly during its fifth regular session with a request for the following funds, the provision of which shall be conditional upon the Commission on Narcotic Drugs and the Economic and Social Council approving the plans the Joint Committee has outlined:

1. Adequate funds to enable the Joint Committee of the Principal Opium-producing Countries and of the Principal Drug-manufacturing Countries to hold a second session in the spring of 1951 to consider in detail a new draft of the proposed interim agreement to limit the production of opium to medical and scientific needs, and to provide for such additional services of the Secretariat as may be required for the preparation and holding of such session and which shall not have been provided for in the budget of the United Nations for 1951; and

2. After the interim agreement shall have been approved by the Economic and Social Council, adequate funds for financing preparatory work for the establishment of the international opium monopoly.

Sir Malcolm Delevingne

Sir Malcolm Delevingne, K.C.B., K.C.V.O., one of the greatest figures in the international control of narcotic drugs, died in London on 30 November 1950, and on 7 December, the Commission on Narcotic Drugs, during its fifth session, after hearing moving speeches by several representatives, paid tribute to his memory by observing one minute of silence.

Sir Malcolm, who was born on 11 October 1868, represented the United Kingdom at various international conferences, particularly the Opium Conferences at Geneva in 1924-1925, the Conference for the Limitation of the Manufacture of Narcotic Drugs at Geneva in 1931 and the Conference on the Suppression of Opium-smoking at Bangkok in 1931. From 1921 to 1934, he represented his country on the League of Nations Advisory Committee on Traffic in Opium and Other Dangerous Drugs. He served as President of the Supervisory Body from its creation in 1933 until 1948, and as a member of the Permanent Central Opium Board from September 1938 until October 1947. All those who had the opportunity of collaborating with him highly prized his competence, untiring work, and devotion to the international cause, and respected in his person the animating spirit and champion of the international control administration of narcotic drugs and of the struggle against drug-addiction.

When, in 1934, he left the Advisory Committee, the representative of the Netherlands expressed in the following words his colleagues' appreciation of Sir Malcolm's work:

"We members of the Advisory Committee on Traffic in Opium and Other Dangerous Drugs . . . desire to acknowledge, with gratitude and admiration, the leading part you have taken throughout its deliberations; to you the Committee is indebted for the initiation of many of the measures which have proved so successful in combating the illicit traffic; and we remember with special pleasure that your zeal for the cause we all have so much at heart has never flagged or suffered discouragement, however dark the outlook may have been. Armed with unrivalled knowledge of the intricacies of a specially intricate subject, expert in administrative work, accustomed to precision of statement and the clear and orderly marshalling of facts and, above all, animated throughout by the most earnest desire to do everything to prevent the abuses which constitute so serious a menace to the nations of the world, you have at all times been fertile in practical suggestions designed to further the work of the Committee. Your skill in debate, your patience, your unfailing courtesy, your wide administrative experience, have been of inestimable value to your colleagues for many years. . . We tender you our most sincere thanks for the invaluable aid you have so freely and unstintingly given at all times. . ."

Dr. Carlos Gutiérrez Noriega

Dr. Carlos Gutiérrez Noriega died accidentally on 26 October 1950. In his tragically short life, he had rendered immeasurable services to science, and all those who knew him either personally or through his work, are united in paying tribute to his memory and in addressing their most heartfelt condolences to his family.

Born on 3 June 1905, he had a brilliant career leading at a very early age to the chair of pharmacology at Lima University and to the Academy of Exact Sciences, Physics and Natural History of Peru. He was President of the Society for Neuropsychiatry of Lima, Head of the Pharmacology and Chemistry Department of the National Institute of Public Hygiene and Health, Director of the Review of Experimental Medicine, Member of the American Society for the Advancement of Science and of the American Society of Pharmacology and Experimental Therapeutics, and also founded the "Review of Pharmacology and Experimental Medicine".

His scientific work on epilepsy and catalepsy, on cocainism and cocaïsm went side by side with philosophical work on the anthropology and psychology of the Peruvian Indian. A Member of the Institute of Hispanic Culture and of the Peruvian Society for Philosophy, he was also a connoisseur of art and literature, as well as a first-class educator, as his text-book "Pharmacology and Its Therapeutical Applications" shows. His research work was particularly valuable for his study of the chewing of the coca leaf, and won for him the high esteem of those who work on the international control of narcotic drugs. His premature death is a grievous loss to the whole of the scientific world.

Bibliography

CANNABIS SATIVA

INTRODUCTION

This issue of the *Bulletin on Narcotics* initiates the publication of a basic bibliography on *cannabis* which, it is hoped, will be useful to specialists in the field and of interest to other readers. The bibliography is general in character and covers many aspects of *cannabis*, including its botanical, chemical, pharmacological, clinical, psychiatric, and criminological aspects. It has been prepared with a view to satisfying a variety of specialist needs. Since so many of the works belong to two or more of the above categories, no logical classification has been attempted: each work has been placed alphabetically by the author. It should perhaps be added that a few articles and books of primarily literary value or sensationalized for popular consumption have also been included to round out the picture:

The bibliography has been divided into three parts, as follows:

Part I: Periodical references of the nineteenth and twentieth centuries;

Part II: Books, documents and pamphlets of the nineteenth and twentieth centuries;

Part III: Literature from the earliest times to 1800.

The present issue of the *Bulletin* contains the first part of this bibliography; parts II and II will appear in subsequent issues.

Although no serious works have been omitted intentionally, it is of course inevitable that a few have been overlooked: readers are invited to submit additional titles which in their opinion would enhance the value of this bibliography.

Credit is hereby extended to three important bibliographers: P. Brotteaux, R. P. Walton, and P. O. Wolff, whose respective compilations of works on *cannabis* were the starting point for the present bibliography, and to Miss Janet Doe and her colleagues at the Library of the New York Academy of Medicine, whose help has proved invaluable.

All articles in the bibliography except those marked with an asterisk have been verified by direct reference.

Part I

PERIODICAL REFERENCES OF THE NINETEENTH AND TWENTIETH CENTURIES

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